Workers producing components for hard disk drives in Thailand are working between six and seven days per week, on 12 hours shifts, struggling to reach impossibly high targets without proper protection in a situation that endangers their health. Workers are increasingly employed through labour agencies, which makes organising efforts even more difficult and puts workers in a precarious employment position.

This report concentrates on Thai hard disk drive component suppliers of global PC brands. The research shows that, although the PC brands have signed codes of conduct that address supply chain responsibility for the entire production chain, second and third-tier suppliers often escape the attention of the brand companies. Thus far, the brands have concentrated their efforts on improving conditions only among their first-tier suppliers.

After being presented with the field research results, the PC brands reviewed the reports and asked their suppliers to explain the research findings. It is striking that none of the suppliers researched referred to the brand companies’ code of conduct, but only reference Thai labour law and local regulations, which are not sufficient to protect workers. Most of the suppliers deny that the often harsh labour conditions described in the report exist, but could only offer their policy as proof.

The limited number of hard disk drive manufacturers worldwide means that global PC brands share a common supply chain. These companies should cooperate to improve the poor working conditions in the industry and involve local labour organisations in their efforts.

Irene Schipper & Esther de Haan
Workers producing components for hard disk drives in Thailand are working between six and seven days per week, on 12 hours shifts, struggling to reach impossibly high targets without proper protection in a situation that endangers their health. Workers are increasingly employed through labour agencies, which makes organising efforts even more difficult and puts workers in a precarious employment position.

This report concentrates on Thai hard disk drive component suppliers of global PC brands. The research shows that, although the PC brands have signed codes of conduct that address supply chain responsibility for the entire production chain, second and third-tier suppliers often escape the attention of the brand companies. Thus far, the brands have concentrated their efforts on improving conditions only among their first-tier suppliers.

After being presented with the field research results, the PC brands reviewed the reports and asked their suppliers to explain the research findings. It is striking that none of the suppliers researched referred to the brand companies' code of conduct, but only reference Thai labour law and local regulations, which are not sufficient to protect workers. Most of the suppliers deny that the often harsh labour conditions described in the report exist, but could only offer their policy as proof.

The limited number of hard disk drive manufacturers worldwide means that global PC brands share a common supply chain. These companies should cooperate to improve the poor working conditions in the industry and involve local labour organisations in their efforts.
Hard (Disk) Labour
Research Report on Labour Conditions in the Thai Electronics Sector

Irene Schipper & Esther de Haan

Amsterdam, May 2007
Colophon

Hard (Disk) Labour
Research Report on Labour Conditions in the
Thai Electronics Sector
Amsterdam, May 2007

By:
Irene Schipper & Esther de Haan

Published by:
Stichting Onderzoek Multinationale Ondernemingen (SOMO)
Centre for Research on Multinational Corporations

ISBN:
978-90-71284-18-2

This document is licensed under the Creative Commons Attribution-NonCommercial-NoDerivateWorks 2.5 License. To view a copy of this license visit: http://creativecommons.org/licenses/by-nc-sa/2.5

This report is financed by:
Dutch Ministry of Foreign Affairs

Additional copies are available from:
SOMO
Centre for Research on Multinational Corporations
Sarphatistraat 30
1018 GL Amsterdam
The Netherlands
Tel: + 31 (20) 6391291
Fax: + 31 (20) 6391321
E-mail: info@somo.nl
Website: www.somo.nl

Subscribe here to the SOMO quarterly newsletter to keep informed of SOMO news and activities.
Contents

1. Introduction to the report ................................................................. 4
2. Methodology ................................................................................. 5
  2.1. The selection of the Thai suppliers ................................................ 5
  2.2. Methodology of field research ..................................................... 10
3. Consolidation among HDD manufacturers ...................................... 12
  3.1. Ranking worldwide HDD companies ......................................... 13
  3.2. HDD manufacturers in Thailand .................................................. 13
  3.3. Thai Board of Investment (BOI) incentives for HDD investments .... 14
  3.4. General promotion and support by the BOI under Special Economic Zones .... 15
4. Thai provisions to protect workers rights ........................................ 17
  4.1. TLS 8001 .................................................................................. 17
  4.2. ILO core conventions .................................................................. 17
  4.3. The Labour Protection Act, 1998 ................................................ 18
5. The research results: Labour conditions at Thai suppliers ............... 22
  5.1. Code of Conduct and buyer monitoring ...................................... 22
  5.2. Labour Relations ...................................................................... 24
  5.3. Discrimination ........................................................................... 26
  5.4. Restriction of movement ............................................................ 28
  5.5. Contracts and job security ............................................................ 28
  5.6. Wages ...................................................................................... 29
  5.7. Health and Safety ...................................................................... 36
  5.8. Work pace ................................................................................. 43
  6.1. Code of Conduct and buyer monitoring ...................................... 47
  6.2. Labour Relations ...................................................................... 47
  6.3. Discrimination ........................................................................... 48
  6.4. Wages ...................................................................................... 49
  6.5. Working hours ........................................................................... 49
  6.6. Targets explained by suppliers ..................................................... 50
  6.7. Health and Safety ...................................................................... 50
  6.8. Work pace ................................................................................. 51
7. Conclusions .................................................................................. 52
1. Introduction to the report

In 2006, SOMO approached a number of Thai labour organisations to research labour conditions in the Thai electronics sector. This research is part of a broader program of SOMO to improve labour, environmental and social conditions in the electronics sector with the ultimate objective of poverty eradication and sustainable development. The program is financed by the Ministry of Foreign Affairs in the Netherlands, European Consumer organisations\(^1\) and European development organisations\(^2\).

The results of this research, along with similar research carried out in China and The Philippines for SOMO, is already being used in campaigning material\(^3\), and has been published in the magazines of 11 European consumer organisations to raise awareness. These publications have reached millions of people, and this is putting pressure on the electronic companies to take seriously the problems identified in the area of labour conditions in Thailand.

SOMO wants to use this report to share the main findings with the organisations involved. The report will discuss the following issues:
- the methodology
- the focus on the Hard Disk Drive sector
- Government incentives and Thai Labour laws
- The research results
- The review process with the brands and the suppliers.
- Conclusions

---

\(^1\) These consumer organisations are members of the ICRT - International Consumer Research and Testing Ltd, which was the official commissioning party.

\(^2\) Bread for All and Lentenfund.

\(^3\) For information about the campaign see the website of Bread for All, Fastenopfer: http://www.oekumenischekampagne.ch/cms/index.php?id=5 The campaign brochure is written in French and German, see the following link:http://www.oekumenischekampagne.ch/cms/fileadmin/user_upload/Computer-Kampagne/Broschuere_Einblick.pdf
2. Methodology

In 2005 SOMO published a report about CSR issues in the ICT hardware sector, with case studies on supplier companies of Acer and Fujitsu Siemens, and which focused on labour conditions in China and the Philippines. The demand for more research which covers not only two companies but all major ICT brands dominating the European market led to this follow up study, which includes a study carried out in Thailand this time. Taking into account the interests of the 11 European consumer organisations and the 2 developing organisations, 8 major brands for personal computers were selected. These brands represented the largest market shares in the relevant national markets of the consumer organisations for personal computers for home use and home offices. IBM/Lenovo was not selected for this reason, even though their world market share would justify their selection.

Selected major PC brands:
1. HP
2. Acer
3. Dell
4. Fujitsu Siemens
5. Toshiba
6. Apple
7. Packard Bell
8. Sony

2.1. The selection of the Thai suppliers

To identify suppliers of the PC brands selected, SOMO relies primarily on the testimonies of the workers. They do know most of the clients of their factory.

To avoid the situation in which the research would not cover all the selected PC brands, SOMO decided to focus on suppliers of Hard Disk Drives, because only a limited number of HDD manufacturers dominate the world market and Thailand is the biggest HDD producer worldwide. All PC brands are dependent on these suppliers for their computers. By including all HDD suppliers in Thailand as well as in the Philippines, SOMO could guarantee that it would cover the suppliers of all major brands. At the same time, this strategy highlights the fact that labour conditions in the supply chain of the different brands often do not differ from each other; in this case all brands buy HDDs from the same limited number of manufacturers which are obviously made under the same labour conditions.

Modularity is typical for the computer industry, with standard key components being assembled and configured in products for different competitors. (see Table 1)

---

## Table 1

<table>
<thead>
<tr>
<th>Company activities</th>
<th>Short name company</th>
<th>Contact details company</th>
<th>Buyers include</th>
<th>Number of employees</th>
</tr>
</thead>
<tbody>
<tr>
<td>HDD assembly 1st tier supplier</td>
<td>Fujitsu (Thailand) Co., Ltd</td>
<td>Fujitsu (Thailand) Co., Ltd. 60/90 (Navanakorn Industrial Estate Zone 3) Moo 19, Phaholyothin Rd., Klongluang, Pathunthani 12120 Tel. 66-2-529-2630, 529-2597, 909-5432</td>
<td>All PC OEMs, including HP, Acer, Dell, Fujitsu Siemens, Toshiba, Apple, Packard Bell, and Sony. Also Hitachi, Matsushita, Nidekobow.</td>
<td>5,000 employees, of which 2,750 contracted through labour agencies, 80% female.</td>
</tr>
<tr>
<td>HDD assembly 1st tier supplier</td>
<td>Western Digital</td>
<td>Western Digital (Thailand) CO., LTD. 60/90/2 Moo 19, Navanakorn Industrial Estate Zone 3, Phaholyothin Road, Klongluang, Pathumthani 12120 Tel.: 0-2529-5222 Western Digital (Bangpa-In) Co., LTD. 140 Moo 2, Bangpa-in Industrial Estate, Bangpa-in, Ayutthaya 13160 Tel.: 0-3527-6100</td>
<td>All PC OEMs, including HP, Acer, Dell, Fujitsu Siemens, Toshiba, Apple, Packard Bell, and Sony.</td>
<td>More than 22,000 employees in Thailand in total.</td>
</tr>
<tr>
<td>HDD supplier: Head Stack Components</td>
<td>LTEC</td>
<td>LTEC Ltd. Head Office and Factory: Northern Region Industrial Estate (NRIE) 68/1 M004, Tambol Banklang, Amphur Muang, Lamphun 51000, THAILAND Tel: (053) 581-002-8 Fax: (053) 581-0101-11</td>
<td>Nokia, Sony (cameras), Acer computer notebooks, Fujitsu microchips, IBM SIMs, Toshiba (calculators), Sharp.</td>
<td>Currently 6400 employees, female employees account for 82% of total</td>
</tr>
<tr>
<td>HDD supplier: Flex and flip chip assembly.</td>
<td>Mektec</td>
<td>Mektec Corporation (Thailand) Ltd. 25th Floor, Room No 2504 Jasmine International Tower 200 Moo 4, Chaengwatana Road Pakkret A.Pakkret, Nonthaburi</td>
<td>Hitachi, Seagate, Fujitsu, Nidec, Western Digital and TI.</td>
<td>Mektec has 3,600 employees as of Jan. 2007</td>
</tr>
</tbody>
</table>

---

5 Due to distances and time restrictions, workers of Seagate and Hitachi GST were not interviewed.
<table>
<thead>
<tr>
<th>Supplier HDD supplier</th>
<th>Innovex</th>
<th>MMI / MMIT</th>
<th>Memtec</th>
<th>Overall:</th>
<th>Electronics supplier for televisions and copiers among others.</th>
<th>Miti</th>
<th>Electronics supplier for</th>
<th>Namiki</th>
<th>Memtec</th>
<th>More than</th>
<th>workers, of which about 1000 are male.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Paragon</td>
<td>Innovex</td>
<td>MMI Precision / MMI Technology</td>
<td>Nava Nakorn Industrial Estate, Zone 1 and Zone 3</td>
<td>Company: Miti took over TPW and continued the Maxtor/Seagate business until 2004. Current main clients: SC Wado/JVC, Fujikura, Shindengen, Fabrinet-Avanex. Workers: main client is Seagate.</td>
<td>Murata Electronics Co., Ltd. Northern Region IE, 63 mu 4 Ban Klang, Muang, Lamphun 51000; tel (053) 581166; fax 581076</td>
<td>Panasonic, Hitachi, Cannon and Toshiba (TVs, copiers and PDP’s), Namiki (Air Sensor service parts)</td>
<td>Memtec</td>
<td>Namiki Precision (Thailand) Co., Ltd., Lamphun province</td>
<td>Memtec</td>
<td>About</td>
<td>More than 3,000 workers, of which about 1,000 are male.</td>
</tr>
<tr>
<td>Mobile phones, digital cameras, vibrations and sound motors.</td>
<td>(Production Division), Northern Region Industrial Estate (EPZ), 60/29 M.4, T. Banklang, A. Muang, Lamphun 51000, Thailand Phone: 053-58-1386-8</td>
<td>Delta Electronics (Thailand).</td>
<td>workers, 90% female.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>---</td>
<td>---</td>
<td>---</td>
<td>---</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Printed Circuit Boards (PCBs) for various electronics products.</strong></td>
<td>CKL Electronics Co., Ltd. Bangpa-in Industrial Estate 139/2 Moo 2 UdomSorayuth Rd., T.Klongjig, A.Bangpa-in, Ayutthaya 13160 <a href="http://www.cklpcb.com/index.htm">http://www.cklpcb.com/index.htm</a></td>
<td>Delta Electronics (Thailand), Panasonic, Sony. (40-50% automotive electronics, 20% computer-related, 20% home appliances.</td>
<td>751, 80% female.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>1st tier Electronics supplier.</strong></td>
<td>Delta Electronics (Thailand) Public Company Ltd., Bangpoo Industrial Estate (EPZ), Delta 1, 3/4, and 5 are located here. Delta 6 is located in Welgrow.</td>
<td>All PC OEMs, including HP, Acer, Dell, Fujitsu Siemens, Toshiba, Apple, Packard Bell, and Sony.</td>
<td>12,000, of which 10,000 regular workers.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
The following charts can be made of supplier relationships between the companies covered by this study.
2.2. Methodology of field research

In cooperation with local Thai labour organisations, SOMO has gathered information on the labour conditions in the factories producing parts or assembling products for computer and mobile phone companies. This information was obtained primarily through interviews with workers of the factories concerned, as well as interviews with trade unions, organisers, labour support organisations and factory management. The interviews with workers were conducted outside of the factory, in a setting where the workers felt safe to speak openly, and not in the presence of the management. A reasonable amount of workers per factory were interviewed. The workers were selected (as far as possible) on the basis of sex, age and type of job so as to be representative of the workforce in the factory.

The worker interviews were carried out as one-on-one interviews and/or through group discussions. The workers were promised that they would remain anonymous so that they could speak freely and would not need to be afraid of repercussions. To avoid any form of punishment from the factory management, the researchers chose to keep all names of the workers anonymous. Whether the names of the factories investigated should be made public was a question posed to each individual worker, and was also discussed between the research team and SOMO.
### Companies and Time Period of Workers Interviews

<table>
<thead>
<tr>
<th>Companies</th>
<th>Time period of workers interviews</th>
</tr>
</thead>
<tbody>
<tr>
<td>Innovex, Murata, Namiki and LTEC</td>
<td>June-July 2006</td>
</tr>
<tr>
<td>Fujitsu and MMI</td>
<td>June-August 2006</td>
</tr>
<tr>
<td>CKL Electronics, Delta Electronics, Fujitsu, Mektec, MMI, Paragon, and Western Digital</td>
<td>October 2006</td>
</tr>
</tbody>
</table>

In addition to the workers interviews, SOMO also had appointments with the following organisations:

- Regional IMF Secretary (electronics) industry.
- Solidarity Center.
- Centre for Labor Information, Service and Training - CLIST.
- Young Christian Workers – YCW.
- Asia Pacific Workers Solidarity Links Thailand - APWSL.
- Greenpeace, Toxics campaigner.
- Good Governance for Social Development and the Environment Institute.
- TEAM (IMF affiliate Thailand, federation with branches in Auto, Metals and Electronics &Equipment.
- President of the TEAM Electronics & Equipment Federation (consisting of 16 in-house unions)/ President of the Panasonic Union.
- Friends for Friends organisation
- Thai Labour Campaign.
- Worker Rights Consortium.

SOMO interviewed the management of the following companies about the implementation of CSR standards and sustainable competitive advantages in the electronics industry:

- CKL Electronics Co., Ltd.
- Western Digital in Ayuthaya
- Hitachi GST, in Prachin Buri.
- Delta Electronics (Thailand)
3. Hard Disk Drive manufacturing in Thailand

It is an interesting leverage point to focus on the HDD industry, due to its position in the supply chain of computers because all PC brands are dependent on a limited number of suppliers. Another reason to focus on this industry is its national relevance; which is underlined by the Thai government's drive to boost Thailand’s position as a major manufacturing base for the HDD industry. This has been a considerable success: Thailand replaced Singapore as the largest global producer of hard-disk drives (HDDs) in 2005. It is estimated that in 2005, Thailand produced roughly 30% of the world's 376 million units, with Singapore making about 25%. In 2004, the industry included 50-60 manufacturers of parts, employing more than 90,000 workers.

Almost all of the HDD-part suppliers in Thailand are currently foreign companies. Almost all HDD manufacturing in Thailand is for export, as domestic consumption accounts for a mere 1 percent.

3.1. Consolidation among HDD manufacturers

In 1985 there were 60 HDD manufacturers worldwide. After mergers, acquisitions and bankruptcies, only seven remained in 2005, owing to fast-changing technology, low profit margins, capital intensive R&D and the high bargaining power of PC manufacturers. In 2006, this number was reduced even further after the acquisition of Maxtor by market leader Seagate. One of the earlier consolidations involved Hitachi Ltd. acquiring IBM's HDD business.

---

3.2. Ranking worldwide HDD companies

<table>
<thead>
<tr>
<th>Rank</th>
<th>Supplier</th>
<th>2005 Unit share</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Seagate</td>
<td>28.7%</td>
</tr>
<tr>
<td>2</td>
<td>Western Digital Corp.</td>
<td>17.0%</td>
</tr>
<tr>
<td>3</td>
<td>Hitachi GST</td>
<td>15.5%</td>
</tr>
<tr>
<td>4</td>
<td>Maxtor</td>
<td>14.1%</td>
</tr>
<tr>
<td>5</td>
<td>Toshiba</td>
<td>8.5%</td>
</tr>
<tr>
<td>6</td>
<td>Samsung</td>
<td>7.2%</td>
</tr>
<tr>
<td>7</td>
<td>Fujitsu</td>
<td>6.7%</td>
</tr>
<tr>
<td>8</td>
<td>Others</td>
<td>1.6%</td>
</tr>
<tr>
<td>All</td>
<td></td>
<td>100%</td>
</tr>
</tbody>
</table>

Source: iSuppli Corp. April 2006

3.3. HDD manufacturers in Thailand

Four of the world's largest manufacturers of HDD produce and export from their Thai operations:

- Seagate Technology;
- Hitachi Global Storage Technologies;
- Western Digital Corp.;
- Fujitsu.

Toshiba and Samsung do not have production facilities in Thailand. A fifth assembler is Union Technology, a Thai owned affiliate of the Saha Group, which operates for Hitachi GST, but is not included in the research.

**Seagate Technology**

Seagate's core activity is the design and manufacture of disk drives and related components. Seagate closed its factories in Rangsit, Chokchai, Tepharuk and Wellgrow a number of years ago and has expanded its capacity in Korat:

Seagate Technology (Thailand) Ltd.
1627 Moo 7, Teparuk Road,
Tumbol Teparuk, Amphur Muang
Samutprakarn 10270, Thailand
Phone Number: +66 (0) 2715-2999
Fax Number: +66 (0) 2715-2278

**Western-Digital**

In Thailand, Western Digital purchased the shares of Read-Rite Corporation, Thailand, which it renamed Western Digital Bang Pa-In Co., Ltd. The company is making additional

---

10 http://www.emsnow.com/newsarchives/archivedetails.cfm?ID=12618
investments in the company and is building a new HDD production facility in Bangpa-In, Ayuthaya, close to its existing operations. The US$ 800 million project is part of a three-phase expansion strategy to be implemented over the next 10 years.\textsuperscript{11}

\textbf{Hitachi Global Storage Technologies}

In March 2004, Hitachi Global Storage Technologies received BOI promotion to manufacture hard disk drives and data storage device components (HGA head gimbal assemblies) at the 304 Industrial Park in Prachinburi Province. Hitachi GST and its local partner, Union Technology Company Limited, a subsidiary of Saha-Union Group, manufacture Hitachi’s one-inch Microdrive digital media, 2.5-inch Travelstar and 3.5-inch ATA Deskstar HDDs in Thailand, which account for roughly two-thirds of Hitachi’s global HDD production.

Bill Healy, Hitachi senior vice president, said in Bangkok that the company would add about 4,000 workers to its staff of 12,000 employees and contract workers to boost production.

\textbf{Prachinburi plant & address (Main office)}

Hitachi Global Storage Technologies (Thailand) Limited
203, 205 Moo 7 Tumbon Tha Tum
Amphur Srimahaphote Prachinburi Province
25140 Thailand
Tel : 66-37-208700 - 715
Fax : 66-37-208718

\textbf{Fujitsu}

Fujitsu received a BOI Certificate in August 2003 for a project to expand its operations in manufacturing hard disk drives and HDD parts.

\textbf{3.4. Thai Board of Investment (BOI) incentives for HDD investments}

The actions taken by the Thai Board of Investment (BOI) designed to support Thailand’s ambition to be the largest manufacturing base of HDDs worldwide include giving the opportunity to new HDD investment projects to locate in any zone and still receive a wide range of industry stimulating incentives:

- To ensure that BOI-promoted HDD companies remain competitive in light of the rapidly changing technology they can import upgrade or replacement machinery duty free.
- The regulations allow both HDD parts suppliers and manufacturers to receive 4 to 8 years of income tax holiday; this varies according to the zone (zoning policy).\textsuperscript{12}

\textsuperscript{11} http://www.boi.go.th:8080/issue/200511_14_11/3.htm
Approved HDD projects also receive an additional year’s corporate income tax holiday for meeting criteria related to Research & Development expenditure in the first 3 years.  

HDD projects also receive an additional two years corporate income tax holiday for expenditure on developing vendors, or supporting related educational institutes in the 3 years and for establishing an R&D centre in Thailand within 3 years.

In total it is possible to build up a tax holiday of 11 years, and with some smart relocating within Thailand, companies can build up new tax free periods. The question is whether attracting foreign investment this way benefits the Thai people the best. One can imagine that major investments in infrastructure are needed to serve the industry and the cleaning costs of the polluted industrial areas, which certainly need to be budgeted for in the future, set off against low tax incomes for the country and limited buying power for the Thai workers due to wages below living wage. In this way, economic growth seems to contrast with sustainable development.

3.5. General promotion and support by the BOI under Special Economic Zones.

The Thai government wants to reform its export processing zones into Special Economic Zones (SEZ) and approved a new bill to this effect on January 11, 2005. The EPZs were set up to boost key export-oriented industries such as electronics. Industries located in these zones enjoy tax holidays on machinery imports and corporate tax exemption for a set period. The raw materials imported for export-oriented production are also exempt from duty. In addition, industries in these zones do not have to apply to the Industrial Works Department for factory operating licenses.

This means that they are officially not

---

1. Average R&D or design expenditures for the first 3 years must: Not be less than 1-2% of annual total sales, or not less than 50 million baht for HDD manufacturing, or not less than 15 million baht for HDD parts manufacturing.
2. At least 5% of the total workforce in the first 3 years should consist of science and technology personnel.
3. Average costs to train Thai staff for the first 3 years are at least 1% of total payroll costs.

---

12 Zone 1, 4 years tax holiday : includes Bangkok, Samut Prakan, Samut Sakhon, Nakhon Pathom, Nonthaburi and Pathum Thani. Zone 2, 6 years tax holiday : includes Ayutthaya, Chachoengsao, Chon Buri, Kanchanaburi, Nakhon Nayok, Phuket, Rayong, Saraburi, and Suphanburi. Zone 3, 8 years: Zone 3 : encompasses the remaining 58 provinces. Source, website BOI, page 'Incentives: BOI Privileges by location', http://www.boi.go.th/english/about/boi_privileges_by_location.asp

13 1) Average R&D or design expenditures for the first 3 years must: Not be less than 1-2% of annual total sales, or not less than 50 million baht for HDD manufacturing, or not less than 15 million baht for HDD parts manufacturing.
2) At least 5% of the total workforce in the first 3 years should consist of science and technology personnel.
3) Average costs to train Thai staff for the first 3 years are at least 1% of total payroll costs.

14 This must be at least:
   • 1% of annual total sales, or
   • 150 Million baht for HDD manufacturers, or
   • 15 Million baht for HDD parts manufacturers

15 Under the 1979 Industrial Estates Act.

16 Such an operating license falls under the Factory Act: The Factory Act of 1969 (amended in 1972, 1975, 1979, and 1992) stipulates regulations for factory construction and operation, factory expansion, and safety requirements. The latest revision of the Act also imposes strict controls on industrial
subject to government controls on industrial pollution, and it is up to the companies to decide how to deal with this responsibility.
The new legislation has drawn strong opposition from prominent critics and activists, because the bill is designed to allow the government to bypass many articles of the Constitution as well as series of environment, city planning and taxation laws to encourage foreign direct investment and fuel economic growth and curtailing the basic human rights of the majority of the Thai people at the same time. For labour organisations, one of the concerns is that SEZs are aiming to facilitate trade and investment along borders to access cheap labour from neighbouring countries.
4. Thai provisions to protect workers rights

One of the PC brands responded that they do not audit their Thai suppliers on social and environmental conditions because of the strong Thai labour laws. But how strong are these labour laws and how do they work in practice?

4.1. TLS 8001

Apart from the Thai labour Law, the Ministry of Labour has shown that it is aware that good labour practices can be a competitive advantage for foreign investors, by designing the Thai Labour Standard TLS 8001. The model of TLS 8001 is very much in line with SA 8000\(^\text{19}\), but critics find it ironic that the Ministry of Labour, which is responsible for implementing and enforcing the labour law, is now working according to a business-driven, voluntary Code of Conduct, authorising private companies to investigate factories, resulting in a certificate of compliance from the ‘Ministry of Labour’. Delta Electronics (Thailand) is one of the few companies to be granted TLS 8001 certification. But ISO certification is very popular in Thailand, almost all companies are certified for ISO 14000, 9001, and OHS 18001 can also be found. ISO certification, such as 9000 and 14000, are quality management systems however, and not systems to measure CSR performance, and all corporate information is confidential.

4.2. ILO core conventions

For many years, the Thai Labour Movement has been working together to call for the government to ratify ILO conventions no. 87 (freedom of association and protection of the right to organise) and 98 (right to organise and collective bargaining). Thailand has been one of the founding members of the ILO since 1919, but the country has only ratified 14 of 190 conventions. Five of the core conventions which Thailand has ratified are C29, C100, C105, C 138, and C 182. Eight core conventions have not been ratified, however, including 87 and 98, which are considered crucial as they can guarantee the implementation of national law that protect workers rights; the passage of these conventions will give workers more opportunities to fight for the right to organise and collective bargaining without discrimination or intervention.\(^\text{20}\)

\(^{19}\) Which stands for Social Accountability standard.  
4.3. The Labour Protection Act, 1998

In January 1998, Thailand’s Parliament adopted the Labour Protection Act (the “Act”), which came into effect on August 19, 1998, 180 days after its publication in the Royal Gazette.

Scope of application

The Act applies to all corporations which seek economic profit unless prescribed otherwise by the Ministry of Labor and Social Welfare. It does not apply to central, provincial and local administrations, nor to state enterprises. A business owner/entity is considered the “employer” of all its contractors’ employees working at the owner/entity’s place of business. All employees, whether full or part-time, seasonal, casual or contract, are covered.

General provisions

An employer cannot request or receive a security deposit from its employees. The prohibition is absolute for child employees (15-18 years of age).

Discrimination: employers shall treat equally male and female employees unless the nature of the work does not allow this, sexual harassment against women or child employees is prohibited.

The BOI website has the following promotional addition related to discrimination:

‘In general, Thai labor laws provide for considerable freedom in managing labor. In many countries, it is not legal to discriminate on the basis of age or sex. Perusal of personnel ads in Thai newspapers finds employers narrowly defining their needs: “The successful candidate will be male, under 35 years of age, not a member of a labor union, and at least 150 cm in height, etc.”’

Working conditions

Working hours: Non-hazardous work, 8 hours a day or 48 hours a week in total. Hazardous work is a maximum of 7 hours a day or 42 hours per week. The employer may request workers to work longer as deemed necessary.

Forced overtime: Employees have the choice whether to work overtime or on holidays, consent must be first obtained from the employees.

Maximum hours overtime: Is limited to not more than 36 hours a week.
Overtime compensation: The rates vary and range from 1.5 times to 3 times the normal wage rate.

Daily rest period: At least one hour after working 5 consecutive hours and not less than 1 hour a day in total. Not less than 20 minutes before the employee starts working overtime longer than 2 hours.

A weekly holiday: At least one day per week at intervals of a six day period must be arranged by the employer.

National holidays: Workers are entitled to no fewer than 13 days per year, and a minimum of 6 days annual vacation after working consecutively for one full year.

Sick leave: As many days as necessary, but maximum of 1 month of paid leave.

Maternity leave: 90 days including holidays but paid leave not exceeds 45 days.

**Female labour**

Pregnant employees: Are not allowed to work overtime, on holidays or between the hours of 10 p.m. and 6 a.m.

Termination of employment: Employers are not allowed to terminate the employment of a female employee because of her pregnancy.

**Child labour**

The minimum age for employment is 15, workers below the age of 18 are banned from dangerous work and working overtime, on holidays or between 10 p.m. and 6 a.m.

**Payment of wages**

Compensation for leave: In case an employer does not provide a weekly holiday or provides them but are not taken, the employer shall pay the applicable rate.

Business: Temporary closure of the employer shall pay its employees 50% of their wages during that period.

Minimum wage rates: The standard minimum wage rates are fixed by the wage Committee. New minimum wages are set per January 1, 2007.

**Welfare**

A national Safety Committee shall be established to determine safety guidelines and a private organisation will assist, train and provide technology and Welfare Committees for business entities with more than 50 employees will make recommendations regarding the companies’ welfare rules, including medical and sanitary facilities.
Severance Pay: Compensation rates are prescribed after an unbroken period of work of 120 days.

Injury compensation: Compensation benefits are prescribed by law for injuries, illness and death as a result of the work.

Freedom of association: The only reference made by the BOI is that Labor Unions must be registered at the Labor Department and require license to operate.

Statutory retirement: Business entities with more than 10 employees must establish an Employee Funds if they do not have a registered provident fund or a pension or retirement fund.

The labour inspector: is given more power under the Act; for inspections of the workplace, to analyse the safety and issue instructions.

The U.S Department State published the country report on human rights practices in Thailand in March 2006 and has made some critical remarks about workers' rights. Concerning the right of association, the report states that the law allows all private sector workers to form and join trade unions of their choosing; however, the law provides inadequate protection to workers who participate in union activities. The law requires that union committee members must be full-time employees of the company, which makes them vulnerable to employers seeking to discipline workers who serve as union officials or who attempt to form unions and it limits unions to organise and be politically active due to time restrictions. Union leaders and academic observers reported that employers often discriminated against workers seeking to organise unions. The law does not protect workers from employer reprisal for union activities prior to the registration of the union, and employers could exploit this loophole to defeat efforts at union organisation.

In 2003, the labour movement represented around three percent of the working class, comprising around 1,100 registered private sector unions, and 45 state enterprise unions and national centres. The Thai law provides for the right of citizen private-sector workers to organise and bargain collectively; however, the government's efforts to protect this right were weak; collective bargaining agreements are few and far between. Wage increases for most workers came as a result of increases in the minimum wage rather than as a result of collective bargaining. The process of setting minimum wages locally through provincial tripartite wage committees may further limit union influence; many of these provincial committees excluded labour representatives and placed factory managers on the wage committees to represent worker interests. The US report concludes that the minimum wage increase in the year 2005 did not keep pace with inflation and was not adequate to provide a decent standard of living for a worker and family.

29 Source is the website of JSM (Johnson stokes & Master), an JSM an Asian law firm http://www.jsm.com/live/Portal?xml=legal_update/article&content_id=2793
The country report of the US Department of State also refers to increasing use in recent years of labour brokerage firms using a "contract labour system" under which workers sign an annual contract which entitles them to no fringe benefits. These workers lack the ability to bargain collectively over wage and benefit issues. Although they may perform the same work as direct-hire workers, they are paid less and receive fewer, or no, benefits.

With regard to the government-mandated uniform workweek of 48 hours, with a limit on overtime of 36 hours per week, the US report states that incidents of employees being forced to work overtime are reported, with punishments and dismissals for workers who refuse.

Finally the report concludes that the enforcement of workplace laws and regulations is the responsibility of the Ministry of Labor's Department of Labor Protection and Welfare, however the department had fewer than 700 fulltime inspectors in 2005 to monitor more than 340,000 workplaces: the shortage of human and other resources significantly impeded effective enforcement of labour laws.

---

5. The research results: Labour conditions at Thai suppliers

5.1. Code of Conduct and buyer monitoring

Although most of the brands for which the factories described in this report are producing have a code of conduct and/or are part of an industry initiative with a code of conduct, none of the workers interviewed from 11 factories had ever heard of a buyers’ code of conduct, nor were they aware of anything posted on the notice boards. Most workers see customers come into the factory, but they are not aware whether they are checking on labour conditions as well as quality standards, and none of the workers interviewed saw the buyers or their representatives talk to the workers. Only in one factory, Delta, did workers hear of a social standard mentioned at their factory; the SA8000 standard, although they did not know exactly what the SA 8000 standard was and if this was implemented at their factory.

Workers from Murata have only seen the company’s omnipresent motto: “Our policy is to satisfy our customers to the fullest extent.” Customers frequently visit, but never speak to the workers. According to the workers of Innovex, the management and other personnel have never mentioned anything about a code of conduct and nothing has even been posted on the notice board. They only know about the company’s rules, which are indeed posted on the notice board. The customers visiting the factory tend to talk to the supervisors, not to the workers. According to the workers of Innovex, the management and other personnel have never mentioned anything about a code of conduct and nothing has even been posted on the notice board. They only know about the company’s rules, which are indeed posted on the notice board. The customers visiting the factory tend to talk to the supervisors, not to the workers. According to the workers of Innovex, the management and other personnel have never mentioned anything about a code of conduct and nothing has even been posted on the notice board.

On the SA8000 website, http://www.sa-intl.org/, there is no mention of certification of Delta in the list of certified factories as of December 31 2006.
Precision workers stated that some buyers had inspected the factory in the past, but that they never interviewed workers. The buyers only inspected the products ordered to see whether they matched the specifications. Most buyers also do not bring their own interpreter with them, and they are shown around by the company manager. A few buyers, such as Fujikura, did bring their own interpreter, but still they did not interview workers.

Factories are usually cleaned when the buyers or their representatives visit, and workers are warned not to look at the visitors. At Namiki, for example, only the shift leaders can talk to the customers. The production workers are not allowed to look at the customers’ faces. The management tells the workers at Murata not to look at the customers and to only pay attention to their work. Customers will only speak with management, and then only about the products, never about the working conditions or problems concerning the workers. At MMI, the workers stated that before the buyers arrive the cleaners are told to wash the floors and make the factory as clean as possible, and workers are forbidden to walk on the cleaned floor before the buyer has arrived.

Management interviews with some of the factories reveal that in several factories buyers do make demands on the management regarding implementation of social standards. However, as described in this report, the interviews with workers show that these issues stay with the management and are not communicated further in the factory. Buyers are not checking whether the labour conditions that they demand are implemented, and generally it is clear that there are serious problems with the labour conditions in the factories studied.

The manager at Delta Electronics mentions that companies such as HP, Sony and Dell stimulate the company to implement good labour conditions and to deal appropriately with environmental issues. Codes of Conduct are mentioned by buyers, such as the Electronic Industry Code of Conduct (EICC). According to the management, Delta Electronics already complies with the EICC. Some of the buyers ask about the suppliers of Delta and even check on them. Some clients hire audit companies, staying for three or four days. They return a month later to check whether the required changes have been made, and then if necessary return again three months later. Some companies are very specific about their requirements, such as not using child labour and not being required to work more than 36 hours overtime per week. Some companies ask for a maximum working week of 60 hours, so Delta is practically in compliance as almost all workers work less than 60 hours. There seems to be no standard policy to check suppliers on social standards.

32 The Electronic Industry Code of Conduct is signed by 25 member companies. According to its website, the Electronic Industry Code of Conduct is a code of best practices adopted and implemented by some of the world’s major electronics brands and their suppliers. The goal is to improve conditions in the electronics supply chain. http://www.eicc.info/EICC_SPONSOR.html, accessed on 22 April 2007. Criticism on the EICC focuses on the initiative having no stakeholders involved, on missing labour rights in the code, on lack of transparency etc.
According to the management of Western Digital, social standards are normally not required by the buyers, apart from Dell, which is the only company that provides a list of requirements on social issues. Their main requirement is usually Occupational Health and Safety (OHS). Buyers such as Dell perform audits once a year. During the audit, Dell talked with the managers, but did not interview workers. Western Digital has a handbook on sustainable standards with different supplements: on H&S, OHS, and the Environment. Western Digital asks its suppliers to comply with ISO standards, but not social standards.33

5.2. Labour Relations

In the majority of the factories, there are no trade unions. For workers this means that in most cases, when there are problems, they have no way - and do not know how - to bring this to the attention of the management. There are Safety and Security and Welfare committees in several factories, but workers generally felt that they were not representing workers, and in several cases were not functioning. No protection is provided to the workers on these committees, so workers are not encouraged to bring up issues. At LTEC, for example, there is a Security Committee and Safety Officers, who are elected. However, most of the representatives and officers belong to the management and not the greater workforce.

At LTEC, workers have no say in company policies or decisions. There are no discussions, exchanging of ideas or meetings with workers to discuss management decisions. Workers simply wait for announcements to be made by the company and then they follow their orders without any input or feedback.

At Murata Company, there is no trade union, and most of the workers had not heard of or were not familiar with the trade unions. When a problem arises that the workers want the company to improve or resolve, they submit their idea in a suggestion box. However, most submissions are never responded to or addressed, and the workers don’t know how else to address these issues. There are many committees, including the Team Building Committee, Safety and Security Committee, Welfare Committee, and the 5 C’s Committee. Any employee can participate in these committees, but most of the committee members are from management as regular workers don’t have any free time to join in committee meetings and activities.

At Namiki, there is also no trade union, only safety and welfare committees. These committees are not composed of workers; there are only management representatives on the committees. The company takes actions that have serious impacts on the workers, without asking for the workers’ opinions, such as changing the bonus from monthly to daily wages. There is no possibility for workers to discuss issues. If the workers have problems or requests about welfare or other issues, the workers can write them down on paper and

---

33 SOMO interview with the management of Western Digital, 12 October 2006.
put them in the suggestion box. The workers interviewed do not feel that the committee seriously care about solving workers’ problems. It seems however that the company is worried about information that workers will exchange. There was recently an announcement from the company announcement board regarding a new rule: “The workers cannot group together to gossip or say anything that will destroy the reputation of the company”.

Fujitsu does not have a trade union. There used to be a trade union, more than eight years ago, but the employer laid off the union members after a strike. The company started hiring contract workers from labour agencies at that time. The workers do not think it is possible to set up a union again. There is nobody who dares to take the initiative to start one. There is a Welfare committee which checks the workplace, the quality of the food and the water. But the workers feel that this committee supports the management more than the workers. This committee is elected by the workers. There is not much contact between the management and the workers, there is a monthly meeting with the management, at which the management gives speeches about working hard. The workers are not informed in advance if there are cutbacks or transfers in the labour force, for example.

There is no trade union in the factory of Mektec. The management does not seem to actively discourage establishment of a trade union, but it provides alternatives to make a trade union unnecessary. The factory has set up an association for the workers, with benefits such as a library, renting CDs and a karaoke machine for break times. There is also a foundation which runs a charity programme. At Mektec, the workers mention abusive supervisors and management; they yell at the workers to work harder, for example. The management threatens to close the factory if they do not work harder. If they work harder, the management says, the factory can handle more orders, so the factory can earn more money which is better for them.

There is no trade union at Western Digital. There is a welfare committee but workers are not very aware of what it does; it acts for the employer. It has a phone line, and there is a box if workers wish to make a complaint. Complaints are posted on a whiteboard, and what the response to it was. Not all complaints are put on the board. The factory warns its staff not to join demonstrations, or be part of organising efforts. Staff are not allowed to give factory information to people outside, in case it has a negative effect on the reputation of Western Digital. If you do anything against the rules, like wearing makeup or eating on the job, you are dismissed.

There is also no trade union at Paragon. The management discourages unionising by prohibiting people to talk with more than five persons together. The management stipulates that if they are any problems, workers must report them directly. Workers at Paragon spoke of the harsh language of the management. The management threatens to close the factory if they do not work harder.
MMI has a trade union. There has been one strike within the last five years, in 2003. The union has had several serious disputes with the company. According to the workers interviewed, the company has now 235 regular workers and 600 contract workers. Of the regular workers, 80% are union members. Three years ago, however, there were 1600 workers, of which 1400 were union members. There was a major labour dispute and many workers were laid off. This weakened the union to a great extent because almost all union members were laid off. The use of outsourced workers has reduced the unions’ bargaining power. At present, workers cannot openly show their membership or participate in union activities. Contract workers, in particular, would face harassment and be pressured to resign. Union leaders have to follow the company regulations very carefully; otherwise they face scrutiny and harassment to force them to leave their jobs.

The company presents counter demands every time the union makes demands for improving the employment conditions using the existing Collective Bargaining Agreements (CBA). The employer is very reluctant to adhere to the CBA, and the union has to repeatedly remind them to implement agreements. The union cannot post anything freely on its notice board in the factory, and has to ask permission from the management first. The employer has threatened to move production to China if the union keeps presenting demands to renegotiate the CBA. The employer has never invited the union to enter into consultations on production, transfers, workforce reductions or layoffs. Everything is decided by the employer unilaterally.

There is a union at Delta, with about 5,000 members (of 12,000 workers in total). In CKL there is a union, which has organised more than 50 percent. There is regular collective bargaining (every two years): efforts are focused at increasing minimum wage and increasing benefits and bonuses, such as an increase in their food allowance. The relationship between the management and the union is not good. A monthly meeting has been held since one year ago, but only to focus on profitability and how to increase the production per worker, not to discuss other issues. There are problems with the annual bonus, which used to be an equal bonus for everyone and now depends on the hours of work. The management does not provide sufficient medical care (very basic care), and does not provide enough safety equipment. Subcontracted workers do not generally join the union, because they can be dismissed easily, and they are afraid to be dismissed for this reason. The union will address this issue at their meetings with management, but management feels it is necessary to keep part of the work flexible.

5.3. Discrimination

In most of the factories, workers report that there is no difference in wages between men and women working in the same position. There are some issues with promotion for women in some of the factories, however. The majority of workers in this industry are female. The workforce of LTEC is 80% female, for example, most of whom work on the production line. Male employees are mostly technicians or heavy load lifters.
At Murata, for example, workers report there is no discrimination in the workplace, workers receive pay according to their positions and length of employment. At the end of each year, rates are adjusted on the basis of job performance. There is no discrimination during the hiring process, and even handicapped persons are hired. Female employees have little chance of promotion, however.

There are reports of discrimination of union members. There are reports of contract workers being fired or pressured to resign if the management finds out they are union members, for example, and who are paid less and/or are not getting bonuses.

Workers employed through an agency are being treated differently for the same work. Apart from being paid lower wages, at MMI, for example, these workers also have to pay for their own uniforms, while regular workers get them for free. They also have to buy a safety mask and safety glasses. These costs are deducted from their wages. There are no medical check-ups for the contract workers, while the permanent workers are given a medical check-up. Permanent workers are given an X-ray to check their lungs. The subcontracted workers interviewed do worry about their health, but it is too costly to pay their own medical check-ups. There are some workers who took a blood test, discovered chemicals in their blood and decided to quit their jobs.

Generally, the contract workers need to carry out a medical test before they start working; blood test, x-ray of lungs, urine test for pregnancy and eyesight tests.

**Pregnancy**

In most of the factories, women are not permitted to be pregnant during the probation period, but in most factories there is no restriction after the probation period. If a woman becomes pregnant during probation, she will be dismissed in most cases. Workers report to be tested on pregnancy when applying for a job through an agency. At Namiki, women are also checked to see if they are pregnant during a health check before they start working, and are not hired if they are pregnant. At Fujitsu, if workers that are employed through an agency become pregnant, they are dismissed. One of the workers interviewed recalled that, when she was applying for a job, the agency took her to the hospital where she had to pay for the tests, which included pregnancy and eyesight. She did not have a choice, she had to do it if she wanted to get a job at the company. At MMI, workers who were hired via a labour agency said they had to supply a medical test first, which includes a pregnancy test. They had to pay for the test themselves. At Murata, a health test is also given to those applying for work, and if a woman is found to be pregnant at that time, she is not hired.
A worker who was employed through a labour agency at Western Digital reported that, after six months pregnancy, she reported it to the factory and was subsequently dismissed. One of the labour organisations in Thailand filed a case with the department of labour, and so she returned to work when she was eight months pregnant. After the birth and one month maternity leave she returned and worked for a month and a half as a clerk at the labour agency, and than went back to work at Western Digital as a subcontracted worker. She has now been working for the agency for more than two years.

5.4. Restriction of movement

In most factories, it is not easy to leave the factory premises when needed. At LTEC for example there is a security guard who checks everyone leaving outside of regular hours. Workers leaving must have permission papers stating the reason for leaving. Workers are given a body search. In Namiki, the workers need a permit to go in and out the factory. They have to get the document before 10 AM and then give it to the shift leaders, shift control, and the office, who then return it to the worker. At MMI, the workers are not allowed to exit and enter the factory compound freely, but must have a passage note signed by their line manager. The passage note must also state a proper reason for exiting the factory.

5.5. Contracts and job security

Workers are hired either on a permanent basis or on contract basis through an agency. Workers who are employed by the company are paid by the day or by the month; when paid by the day, only the working days are paid, by the month is calculated on the amount of days there are in a month. Most workers are therefore paid by the day. Being a contract worker does not provide much stability as you can be dismissed when orders are low or for any other reason.

In several of the factories, workers who are initially hired as contract workers are given permanent contracts after a certain period of time. In other factories the workers are kept as contract workers for a long time, often years. In most factories the percentage of contract workers increases in the peak season and decreased in the slack season. Only Delta Electronics is reported to have a declining number of contract workers (currently 20 percent compared to 40 percent a few years earlier).

At Namiki, for example most of the workers are full-time and after four months probation, 95 percent of the employees become permanent daily workers, either on a daily wage or monthly salary (supervision and management). At Ltec, most of the workers are employed on a permanent contract (after passing a probationary period), either on a monthly salary or daily wage. Part-time staff must sign four-month contracts. After four months and a health check, workers can apply for another four-month probationary period. If they pass
this probationary period, they are then given permanent employee status. If they do not pass any of the steps, they are eligible to reapply for the entry-level position and attempt to work their way up to a permanent contract again.

At Fujitsu, the company employs a substantial amount of workers through a labour agency. These workers are changing constantly, sometimes staying no longer than three months; this depends on the orders. They employ workers on regular contracts when they are satisfied with their work. Workers who are employed through a labour agency can become general workers at Fujitsu when they have a good employment history, which means they don’t skip work, take leave or come to work late. You have to work for eight months with a clean record. If you are absent for one day during this period your evaluation period increases to nine months, and two days to 10 months, etc.

At Innovex, when there is little work the company rotates workers and responsibilities to other, busier, areas. Permanent employment is offered to workers who pass a probationary period, after which they are paid on a daily basis.

Namiki has rarely fired permanent workers, except in 2005. At that time hundreds of workers who had not completed the probation period were laid off because of decreasing orders. They were not paid any compensation except the last month’s salary. Some workers were sent home until the situation improved. During that period, the company paid 70 percent of the salary to the workers, except pregnant women, who only got 50 percent, and they had to show up at the company at the beginning of each month to find out about the work situation. This situation started at the end of 2004 until 2005 and has improved in 2006.

There is a great deal of contract labour at MMI; in several of the facilities only 20 percent of the workforce are permanent workers, the rest are employed through labour agencies and have no job security. The length of their employment contracts is completely dependent on the volume of orders the company receives. Some workers have been there for five years and are still contract workers.

There are more subcontracted workers than regular workers at Western Digital. One important difference is that subcontracted workers do not receive an annual salary increase.

5.6. Wages

The minimum wage in Thailand in October 2006 was 184 Baht per day, for the Bangkok area. In the Lamphun area, in the Northern part of Thailand, the daily minimum wage is lower - 145 Baht. In some of the factories, the payment is higher than the minimum wage,
in some other factories the bonuses paid are better. In most factories, workers need to work overtime in order to earn a living wage.

Bonuses are paid as incentives, annual bonuses, target payments, shift payment, fuel costs and normal and overtime food costs. Bonuses are also paid for specific work such as welding, attendance bonus, living allowance, etc. Factories pay different bonuses and different amounts.

Bonuses can be quite substantial. An example of this is the attendance bonus paid at Delta. This is an attendance allowance of 1000 Baht for workers who are not sick for even half a day per year. This increases by 1000 Baht each year, for up to 10 years. So the maximum bonus for not being sick the whole year is 10,000 Baht after 10 years. If a worker is sick for half a day, he or she loses the entire bonus, and starts again the next year at 1,000. They have 11 vacation days per year, so workers often use their vacation days for sick leave in order to keep the bonus.

Salaries are lower at Namiki Company than at other factories and workers stay on daily wages; some workers have been there for more than 10 years and they still have not received monthly salaries. Even with the bonuses and overtime pay, workers said they did not have enough income, and they must find outside sources of income through selling various items, lending money for interest, playing the lottery, gambling on soccer, selling copied VCDs. Most workers have to send money home to their families. Workers say that they send home more than 1000 Baht per month during the growing seasons, but during planting and harvesting seasons, or during special times they must send home 2-3,000 Baht per month. If they have children back home, they must send more money.

The minimum wage at Fujitsu is 184 Baht per day; by working substantial overtime, workers can earn double this. When the orders are low they earn substantially less and have problems making ends meet. Some try to supplement their orders with additional income; for example by selling phone cards. The workers are able to advance to different grades, which entitle them to a higher wage rise per year (although advancing is quite hard). The attendance bonus is accumulative; they receive 150 Baht the first month, for example, 200 the second, etc., up to 700 Baht. If you miss work or are slightly late, you do not receive any attendance bonus that month and drop back down to the bottom of the ladder. Workers who are employed through a labour agency do not receive an annual bonus, no social security, no other bonuses, no insurance and are paid less for work in the holidays than workers who are employed by the company itself. They are also not paid for missed days when they have to see a doctor, for example. At the end of the month, the agency deducts a certain amount of money, not always a fair amount. One worker reported that between 200-400 Baht was deducted from the monthly pay. These deductions were much more than the amount agreed upon, so the worker appealed to Fujitsu and Fujitsu has taken it up with the company. In total, the labour agency deducted about 1000 Baht too much.
One of the workers at Fujitsu said in an interview that there was no way that she could live on 184 Baht per day. She rents a room for 1600 Baht per month (including electricity and water) and spends 30 Baht per day on food for herself. Her husband works as well and her child lives with someone else. It would be very hard to both be working and live with their child. They are planning to move away after they have saved some money. Her family has a farm and she would like to move back and continue working in the countryside.

Workers get into problems when the workload decreases and they can’t make their normal overtime hours. The wages paid for normal hours is simply not enough to live on. Most of the workers have to send money to their families and/or their children as well. These expenses are the greatest during harvest times, when extra money is needed to hire workers or rent machinery to harvest the family’s crops. This touches upon one of the major issues relating to working conditions in this industry. When companies keep the workers’ wages at a low level, workers are not able to make ends meet without a very substantial amount of overtime. Management subsequently has to guarantee a very high amount of overtime. One of the issues being highlighted by campaigners is that the amount of payment for a normal working week (which should not be more than 48 hours) should be enough for a normal family to live on.

At Delta, the main problem the union was addressing at the time of the interviews in October 2006 was that the wages are too low to cover the basic needs of the employees. At other factories, workers can improve their wages by working overtime, but not at Delta where the working week is limited to a maximum of 60 hours. This demonstrates clearly that the current minimum wage is not a living wage, not even with a certain amount of extra hours. Workers are incurring debt in order to make ends meet. Some of the workers explained that because the salary is so low, their debts are increasing steadily every month. As soon as they receive their monthly wages, they have to pay off their debts. This means that they have no money left for the rest of the month, so they have to borrow money again.

At Namiki, when there is not enough work in one area, the factory sends workers to help out at other busier places. Namiki does not lay off workers temporarily when work is low, they try to move them to where there is work to be done. If a worker’s wages decrease from 7-8,000 Baht/month to 4-5,000 Baht/month due to a decline in work for the company, however, many of them leave the company by themselves.

Workers at Innovex mention that without overtime they don’t have enough money for their living costs. With the money they earn through overtime, they have just enough to cover living expenses, but they can’t save any money. Most of the workers at Innovex are looking for work at other factories. “We have to be frugal, because we aren’t able to do any work at other times in order to supplement our income - we have to work our shifts. We have to try to work as much overtime as possible, as well as working holidays and Sundays to increase our incomes”. 

The research results: Labour conditions at Thai suppliers  31
CKL is not offering overtime for the workers at present, and the normal wage is not sufficient to live on. This is the reason that a lot of workers are resigning from the factory at the moment. They can’t pay the bills, run up debts and are then unable to pay them. They resign from the factory and seek employment elsewhere, for example at factories where they can work more overtime. The average debt per person in Thailand is 30,000 Baht. Low wages force them into having to borrow money.

The pay scale of LTEC is similar to those of other electronic components factories. Salaries are slightly lower, but benefits and security are better. On average the total monthly salary, including special pay and overtime, is 7-8,000 Baht. Most LTEC workers said their salary does not provide enough income to cover their living expenses, so they must have outside income sources from selling various items at work, such as lottery tickets, phone cards, boiled eggs, coffee, or from taking bets on soccer games, lucky numbers, anything that people will buy. Most workers send money back home to their parents or children. On average, each worker also supports one or two dependents back home.

When asked if the pay is enough to survive on, workers at Murata replied, “it’s not enough to cover the cost of living…” In order to supplement their incomes temporarily in times of need, some workers therefore borrow money from friends or others, and repay these loans at high interest rates, or they supplement their income in other ways, such as by selling various goods. Other means to increase income include playing the lottery or betting on soccer matches, which obviously adds to their costs if the expected gains are not forthcoming. Most workers have to send money back home to support their children. They must pay off their debts with a large part of their income (debt is incurred both through borrowing cash and making purchases). What is left of their income they use for housing, food, sending money back home etc. Most workers do not have any savings - they use all of their salaries.

The wages of the workers at MMI differ between the regular workers and the contract workers. The wages are generally higher than most other electronics companies on the same industrial estate. The benefits are also better, for instance there is an annual bonus equal to one month’s wages, there is a monthly diligence bonus of 450-500 Baht, a night shift allowance of 30 Baht, free transportation, free rice and there is also an annual new year party and a sports day. The workers generally earn a substantial amount compared with other factories (workers mention 8000 Baht per month). For the contract workers, the situation is different. They only earn 184 Baht per day (or 4,784 per month (184x26)), they get no annual bonus, and their diligence bonus is 150-200 Baht per month. They do have free transportation and free rice. The low wages for contract workers makes it impossible to make ends meet without working overtime. The workers receive overtime payments in accordance with the law. Most of the workers have four to five dependents, for instance their parents, grandparents and offspring who they have to send money to back home. Most workers must send at least 1500 – 3000 Baht per month. Workers often pay 1900-2000 for rent and another 500 for electricity and water. The workers often also have to repay loans and credit card debts. The interest on informal loans is 10-20 percent per month.
There is not much advancement in salaries

Workers have a hard time to advance in the companies to a higher salary grade. For example, at LTEC workers report that since the minimum wage increase, new workers receive almost the same amount as workers who have been here one or two years- there is only a one or two Baht difference in pay rates between new and experienced workers. After one or two years, workers receive 148 Baht/day, while new workers receive 145 Baht/day.

Working hours

The normal working week is 48 hours; 6 days per week, 8 hours per day with Sundays off. During peak periods, when there are many orders, workers have to work overtime. In most of the factories, workers want to work the overtime in order to increase their pay (see also information on wages). The overtime is often compulsory however, and it is often impossible to refuse to do the overtime or only if you can convince the management that you have a very good reason. During peak periods, workers in some of the factories, have to work 11 or 12 hours a day, 7 days a week, for weeks on end.

If there is a lot of work at Innovex, it is very difficult to ask time off from overtime, workers cannot refuse to work it. If a worker has some personal business and cannot work overtime, they can ask the company for permission to leave, and the decision is left up to the worker’s supervisor. If the supervisor does not approve the request, the worker must follow orders and work overtime.

In periods when the orders are slack, the workers will miss out on overtime payments. In some of the factories, the workers are forced to use up their holiday allowance when there is no work. The workers from Innovex report that “Now there is very little overtime, no work on holidays, and the company forces us to take rest days. The company’s policy is that if we don’t use any of our personal days, the company has to compensate us for each day. What has often happened, however, is that when new workers come in, they have tried to be compensated for unused personal days, and the company has told them that they used them all already. Some workers have shown up at the factory dressed and ready for work, only to be told that they must use one of their rest days, and the worker has no choice but to follow the orders. One time, a worker only put in one hour at the factory before they sent him home with a note requesting personal leave (because there was no work that day). “ Sometimes, we start work at 7AM and by 7:30AM we are sent home because of no work.”

About two years ago, there was so much work at Innovex that some workers started work at noon and finished the next day at 7 AM. Workers starting at 4 PM worked until 7 AM the next morning, and those starting at 7 AM finished at 10 AM the following morning. The workers called this an “overtime marathon”. One worker called the Lamphun Labour Protection and Welfare Office and informed them of the forced labour at the factory. The officer then told Innovex to cease the long overtime working hours.
At LTEC, the workdays are eight hours long according to regulations, but actually, employees must work 12 hours a day, and most work seven days a week (including holidays). Sundays are off when changing shifts, but mostly workers are required to work seven days a week.

At LTEC, when a worker was asked how much the monthly salary would be without overtime pay, the worker answered, “umm…. That’s impossible to answer, because if we did not work overtime, we would be fired…”

At Murata there is forced overtime work and forced work during the holidays. If a worker does not work overtime or during holidays, they must submit a valid reason for absence to their supervisor beforehand, which the supervisor will consider. If the supervisor does not think it is a valid reason, they will not permit the worker to take leave from overtime work. Workers therefore have no choice but to work overtime and work on holidays. Working hours are usually 12 hours per day, including overtime. They work five or six days a week, depending on the company’s schedule. They regularly work overtime, depending on orders. If there is a large order, workers are required to work overtime. If there are not many orders, workers can take days off, but if there is a lot of work, they must work on holidays. Overtime and holiday pay is paid in accordance with company regulations.

At Namiki, the normal working hours are eight hours a day according to the labour laws for a five or six-day week, depending on the work schedule. On average, workers work 10 hours a day (including overtime). They are issued with an overtime form each day. If the workers don’t want to work overtime, they have to tell the shift leaders to find someone else. Some shift leaders don’t want to find anyone, and force them to work overtime, others tell the workers if they could find someone else, then they wouldn’t have to work. This depends on how much flexibility the shift leaders have to solve the problem. The workers have to have a valid excuse to be absent from overtime, such as going to a funeral of a close family member. If they don’t work overtime when requested, the work leaders give them a warning.

At CKL, the regular shift is nine and a half hours per day, five days per week (not six days as in other factories). Including overtime it is 12 hours per day in the peak season. Peak season is six months per year, January until June. The workers say that sometimes they have to work two shifts in one day, working 24 hours in a row. It is voluntary whether they work six or seven days per week, but if you refuse to work overtime, you won’t get overtime when you want to work.

At Fujitsu, the workers report that normally they start working at 7AM until 7 PM, six days a week, including overtime. Two other workers from another department report that they work 11.5 hours per day in the high season, six days per week. The overtime is compulsory, but if they have very good reasons, workers can take time off once in a while. They do try to work the overtime, however, as they need the money - the normal salary does not cover their basic needs. If they do not ask permission not to work overtime they
The research results: Labour conditions at Thai suppliers

get a warning, and part of their annual bonus is deducted and they sometimes do not get a pay rise. After three warnings, a worker has a final meeting with the human resource manager, and if another warning is issued, they are dismissed. Overtime is usually not known in advance, but is announced two hours before the end of the day. They are given one day off per week, but can work the seventh day voluntarily. Many of the workers do this. Normally, one of the workers explains, she works seven days a week, but in the low season there is less production, so she works six days. Two other workers said they worked on Sundays when needed, which is about twice a month. Although Sunday is voluntary, it is almost impossible to refuse when there are many orders.

At Mectec, they work 10.5 hours each day and must provide a very good reason to get out of working overtime. A normal week is six days, but during peak seasons they also work on Sundays. Peak season is about three months a year, during which they work 7 days a week.

At Fujitsu, the company has installed a radio to keep the workers awake so they do not fall asleep. At 1 PM and 5 PM there are exercises for 15 minutes in which everyone has to participate, with music and a trainer.

At MMI, workers must work 12 hours a day; it is even written into the hiring contracts of contract workers that they are required work 12 hours a day. The employer requires the employees to work 36 hours of overtime per week. Workers often have no opportunity to take even a single day off in a month. The only time off they get is then when the shift is changed (once a month), when workers have almost a whole day before they have to go to work again. The employer informs the staff on Saturday whether they have to work the following Sunday. If a worker does not wish to work the overtime, they have to request permission from the management. Without permission, the worker is given a warning; this is serious, as a contract worker can get fired after one warning and a second absence without permission. Regular workers can get a second warning after which they have to stay home for three days; they are dismissed after a third absence for overtime.

The peak season at Western Digital lasts for 10 months of the year. During this time, some of the workers work seven days a week, 12 hours a day. One of the woman workers reports that “When we do not work overtime we are given warnings. Some of the supervisors issue you with a suspension for a few days after one warning”

Not all overtime is compulsory, but overtime is also at the discretion of the employer, which with a salary so low can bring workers into serious financial difficulties. At Paragon, for example, the peak season runs from June until the end of the year. During this period, they work overtime every day, and also every Sunday. The first shift is from 6 AM to 2 PM; if workers do not reach their targets during those seven hours then they do not get any overtime. The overtime is usually three and a half hours which means overtime is from 2.30PM until 6PM. Overtime hours are paid at a higher rate. At Western Digital, also, workers are afraid to miss overtime, because if you cannot work overtime you have to
inform the supervisor, which is not a good thing to do as it can mean missing out on more overtime.

Not all factories have this much overtime. At Delta, for example, the management explained clearly that the working hours do not exceed the 60 hours standard set by the ILO. The workers indicate they work 50 hours per week on the day shift and 57.5 hours on the night shift. Regular overtime each week is between 2 and 9.5 hours. Workers are struggling in this factory, however, as the low wages and “normal” working hours pose an income struggle.

**Targets**

Some of the companies set high targets for workers, which they have to meet within the normal working hours. As the targets are set high, this causes additional stress for the workers. Workers at several companies reported that they delay going to the toilet, do not take their full rest periods and do not wear protective clothing in order to be able to reach the targets.

At CKL, for example, the target is set very high and the workload during the peak season (pace and hours) leads to overload. If the workers do not make their targets, they are given a warning. These warnings have an impact on salary increases, and also affects their bonus at the end of the year. Also at Paragon, if the target is not met then the annual bonus of 5,000 Baht is cut. Workers at Namiki are scolded if they do not reach the targets. These targets are fluid, however, and when the workers reach the target number, the company increases the number incrementally, according to workers at Namiki. Their progress is checked by the computer sensor program. If the workers cannot reach the target number, the workers who have not yet completed their probation period are fired or moved elsewhere. At Western Digital, the company sets targets which influence which salary grade you receive. The targets are set very high and are increased when the workers finally reach them. Workers receive additional bonuses if they move up a grade, so workers try to reach them.

### 5.7. Health and Safety

**Chemicals**

When chemicals are used in factories, workers generally worry about possible health damage and long term health risks, and in several factories there are no proper protective measures and/or equipment. In some factories, such as LTEC, protective gear is provided and there is information available on the hazardous chemicals, and the company provides instructional training for those who use them. Nevertheless, other workers who do not work directly with the chemicals worry whether they will be affected in any way, and that they are not being informed about them. Workers in almost all the factories reported that they are worried about long-term health issues, because of the large amounts of exposure to hazardous chemicals without proper protective equipment. In some of the factories workers, reported that they have tried to wear some of the protective clothing, but have
found it either uncomfortable and restrictive, or it does not allow them to work fast enough to meet their targets.

At Fujitsu, workers are not informed very well about the hazardous chemicals with which they have to work. They are given protection, but they still worry – particularly if they are pregnant.

Not much information is available about other factories, such as Innovex, where workers are also worried about inhaling toxic fumes, because they don’t know what chemicals they are inhaling or what the effects will be. During the annual health check-ups, they have been told that their health is normal but they do not trust the check-ups. There is generally a need for information that is not given by the employers. There is some exposure to chemicals at Innovex for some of the employees. Chemicals that they are aware of include boric acid (concentrated). The turnover rate of workers who use this chemical is quite high.

In most factories, workers are given a regular health check, but there is not much confidence among workers on its usefulness.

At CKL, the workers report that they are given medical check-ups. No-one is ever diagnosed with a work-related ailment during these check-ups, however. When one of the workers went to another hospital, he was told that his lungs had been affected. The hospital gave the worker a certificate, stating that he had been affected by toxins. He gave this paper to the human resources department and they transferred him to another department. At LTEC also, workers do not feel greatly comforted by the annual check-ups; when given the annual health check, all the workers passed. One worker said, “We feel like we still are suffering, but we all passed the health check (…) I had no hearing in one ear, but still passed the hearing test (…)”

At Delta, workers also have very little faith in the annual medical check-up. One of the workers reports that they work with lead solder, and they are afraid for their health. The medical check-up is very basic, they do not trust it and would like a better one. At MMI, some workers took a blood test outside of the company, discovered chemicals in their blood and decided to quit their jobs.

At Namiki, workers are worried about long-term health risks. There are many hazardous chemicals in the work place, including lead solder, glue, ink, conductivity fluids, IPA fluids, solvents and some toxic Japanese chemicals. These chemicals are used on the production line. Namiki Company issued information to the workers saying that solder is not a dangerous material. However, lead solder is a heavy metal and a highly toxic material. Namiki Company gives each worker one carton of milk per day, which they say will help cleanse chemicals from the body. “We don’t know how much of the chemicals are driven out, the company only says it will ‘help’”. Some workers were sick and went to Chiang Mai (far from the factory) to be treated. In Chiang Mai, the tests found dangerous levels of solder in their bodies. At the factory, health checks showed low levels of solder. These workers continued their work at the factory as before.
The main problems with H&S at CKL are also to do with the chemicals that are used in the factory and the lack of sufficient safety equipment. Although this issue has been raised with the management, it is simply ignored - the management states that they have no budget for improvements. The company is not providing sufficient medical care (very basic care), and does not provide enough safety equipment. There is one department in which workers are exposed to chemical smoke, where chemicals are being mixed; the workers complain about skin irritations and coughing. Another department works with paints, with insufficient protection.

Some factories do provide proper safety equipment or health checks.

At Mektec, there is a problem with aluminium dust, but the workers have good protective glasses, masks and ear protection, and all the equipment is provided free of charge. Every year there is an extensive medical check, with blood tests, urine tests, x-rays of the lungs. The more dangerous the work performed, the more medical checks the worker gets.

At Murata, safety equipment is available according to the needs of each job, including safety boots and air filter masks. When using IPA fluids, for example, workers at Murata must wear masks in accordance with company regulations. If a worker is not wearing the mask, they are given three warnings (the second warning is a written warning and the third warning is the last before action is taken). Workers are generally satisfied with the health and safety conditions, and feel they meet higher standards than in most factories. Workers are still worried about their health and safety, because they must work with hazardous chemicals. The solder smells very bad when they use it. If they use it incorrectly it disperses throughout the workplace and the vacuum hose does not have enough power to clean it all up.

**Work accidents**

There are work accidents reported, and in most factories this is treated seriously.

There were two major injuries in LTEC in July 2006: the first was when the Blank machine fell on a worker’s hand, the second was when a loose nut caused a metal component to fly off into a worker’s leg. When an accident occurs, the safety officer takes photographs, and the Japanese staff come down. It is taken seriously, because the company is trying to reduce and prevent accidents. When an accident occurs, the company investigates to determine whether the accident was the result of negligence or machinery failure.

At Murata there are very few accidents in the workplace. Cutters tend to suffer the most injuries. Any on-the-job injuries are taken very seriously, as the company has a policy to reduce worker injuries to zero.

Murata is working to reduce the accident rate in its factories to 0 percent, and the company makes safety announcements during each morning meeting. There is also a competition between factories to see which has the fewest accidents. If a factory does not have any accidents during a specific period, it wins a prize.
At Innovex, work injuries are taken extremely seriously, and safety officers come and take photographs when they occur.

There are not many worker injuries at Namiki, and most of them are minor, such as small wounds from using cutters. Usually, if a worker gets a small cut, they do not inform anyone, and just go to the bathroom to clean it. Workers are afraid to inform the safety officer, because they are afraid of getting into trouble.

One worker at Mektec had an accident with a machine and smashed her hand, even though she had already warned the management that the machine was defective. They didn’t fix the machine and she hurt herself badly. The management paid the medical costs and her sick leave. She returned to work, although her hand never healed completely.

**Health problems**

Health problems include fatigued eyes, backaches, sore legs for workers who are forced to stand and respiratory problems. Workers on the production line are exhausted from having to work such long hours. Some workers using magnifying lenses suffer from fatigued eyes and migraine headaches, some have soreness in the eyes leading to headache, and some have swollen red eyes that look like they have been stung by wasps, and they have to stop working for a week to recover.

Safety inspectors at Murata have told heavy lifters that they must use two people to lift heavy boxes, but in reality most workers don’t do this, because it takes more time, and they are afraid that they will not be able to finish the job on time.

Workers have to scrub their hands, faces, etc. with soap when working in the clean rooms, which causes skin rashes (at Fujitsu, for example).

In many factories, such as at Innovex and Namiki, there are not enough toilets. At Innovex, the workers have to wait in line. Workers do not often get a chance to use the toilets, because they must first get a pass from the leader or supervisor, without the pass they cannot use the toilet. Some workers suffer from bladder infections because they are forced to hold their urine, others suffer from abdominal pains or swollen legs, but do not know what is causing the pains. At LTEC there are also not enough toilets, and they are not clean. The number of toilets has not increased, even though the number of new workers increased by 2,000 last year.

At Namiki, there is a lot of dust in the factory. There are air conditioners to control the air temperature, but this is not sufficient. Workers suffer from sore shoulders, stiff muscles, and migraine headaches. They have to take muscle relaxants to relieve headaches, due to neck strain from sitting in different levels of chairs on the production lines.

At Paragon, the workers were used to working with protection masks, but these have been withdrawn because the company wants to save money.
The main problems at Western Digital are aluminium dust, noise and low temperature. It is cold in the clean room because this is necessary for the production process (17 °C). The problem with the aluminium dust is in the kitting out room. The washing room where the (male) workers have to work is noisy; they do wear big earplugs and ear protectors. There is a health and safety committee in the factory. Safety equipment is provided for working with chemicals such as IPA and ethanol for cleaning.

Case study on MMI

The workers at MMI who work on the metal cases for HDD are very concerned about their health and safety. When it rains the water leaks, which sometimes results in electrical sparks because the electrical plugs are all covered in aluminium dust. The leaks also cause acid fluids to move through parts of the factory. The factory building is old and dilapidated. Workers are afraid that it will collapse one day. There isn’t enough light and there are a lot of different kinds of dust (aluminium, lead and sand).

The workers only receive a mouth cap, which does not sufficiently protect them against the dust. One woman, who had worked 12 hours a day for 4 years, had developed problems with her health because of the aluminium dust. She went to the doctor who discovered a lot of aluminium dust inside her lungs. After this she was transferred to another department on her own request. Her health subsequently improved, but she is still unable to speak normally. No improvements were made by the management after her sickness in that department. Some workers have to pay regular visits to the doctor to scrape out dust from their throats. When the workers cannot take it any longer they ask their line manager to switch workplaces. Despite the fact that workers are being transferred due to obvious health issues, the employers simply assign another worker to take over the work station, so the problems with contact with lead dust remain unchanged.

There are no attempts to improve the production methods to make them safer. The factory is very hot due to the casting oven. The workers suffer from heat rashes, sore and dry throats before they have completed their first year of employment. One of the workers said “The melting of the aluminium is a problem, the melted aluminium runs into a base and then a machine presses it, which causes the aluminium to splash all over the place, even reaching the ceiling. When aluminium hits your skin, it really burns”.

One contract worker interviewed went to Nawanakhorn Hospital where the doctor diagnosed her illness as OHS related. She was told that she had to get her throat cleared of lead dust immediately otherwise she would risk cancer. The doctor did not write in the doctor’s notice that her illness was occupational, however. The notice only stated that she had an infection.

During the last fire drill three months ago in one of the facilities, some of the fire extinguishers did not function properly, and they did not contain any powder. There is one fire exit but it is locked, because the employer is afraid of theft. Even if the door wasn’t locked workers would not be able to use it as the emergency exit leads out to the back wall. At another facility, when the local district officer from Tha Klong held a fire drill, the company failed. The company only passed after the management had invited firefighters from Ayuttaha to provide training. The building has the legally required number of fire exits.
Workers are in contact with the following substances: Lead, thinner, sodium Hydroxide (Fire Soda), acid salt (which is corrosive), thinner and DI solution. Loud noise also affects workers' hearing. Regular workers are issued the following safety gear, free of charge: masks, earplugs, glasses, safety shoes. Outsourced workers are issued masks, earplugs and glasses free of charge, but safety shoes costs 350 Baht per pair.

Eyesight is also a problem: because of the heat, safety glasses become steamy and therefore some workers refuse to wear them, but the dust and smoke is bad for their eyes. Part of the work entails lifting heavy equipment and controlling machines that are very hot, but workers are provided with only simple cloth gloves even if they have to handle pieces of metal that are still hot.

The drinking water is not clean in either of the factories, but workers have no other choice but to drink it. Sometimes when the water is not cold it has a salty taste. Workers often face health problems. Accidents include electric shocks, knife and sandpaper cuts. One worker broke his legs when he was hit by a fork lift. The company has no policy on solving the occupational hazards of the workers.

The union made complaints to the provincial Labour Protection and Welfare Department. An inspection was carried out, and the only aspect which did not pass the inspection was the light level - the smoke, noise and dust levels did pass the inspection. The union wonders why. There is a H&S committee in the factory but it is ineffective.

**Safety problems**

Most factories have fire extinguishers and fire escape plans. Most of the reports of the workers mention measures in place. At LTEC, for example, there is an annual fire drill and escape plan. Workers do not have much confidence in these plans, however, and said that if there was a real fire, they would have to escape on their own initiative. Once there was a small fire that was doused quickly, and when the fire alarm went off, no one paid attention to it. The workers can hear the alarms, but they aren’t sure exactly in which building the fire is located, where the fire extinguishers are, and whether the fire door is locked. At Innovex, there are three lights illuminating each of the fire exits, but the company only turns one of them on, in order to conserve electricity.

**Sickness and maternity leave**

The workers in all factories can take 90 days maternity leave. In most of the factories, there is a nurse’s room and there are nurses on duty, 24 hours a day in some factories.

At Innovex there is a nurse 24 hours a day. When a worker becomes ill, they are allowed to rest for up to two hours. If they need longer than this, they must take a sick day. If they use the sick day, they lose their hard-work pay benefits.

There is a health centre at Murata with a nurse on call 24 hours a day, as well as a physician who visits regularly. If a worker becomes sick during working hours, they can
visit the health centre and receive treatment. They can rest at the health centre for a maximum of 2 ½ hours; if they need to rest longer than that, they must take a sick day. The decision is based on the nurse’s recommendations. Workers do not have to pay for the services rendered at the company’s health centre.

In most factories, workers are allowed up to 30 sick days with pay according to labour laws. At Innovex, workers must present a medical certificate and telephone the supervisor to inform them of their absence, even if only taking a single sick day. At LTEC, sick days can be granted by supervisors, but a medical certificate is required for sick leave of more than three days. For single sick days, however, a worker has to be on the good side of the supervisor. If the supervisor does not like the employee, he or she can deny them permission. “Once a worker was very sick and asked to be excused, but the supervisor would not allow it. The supervisor would only relent and allow permission after the worker’s spouse called the main office to ask permission (the main office ordered the supervisor to grant permission)”. Permission from the supervisor depends on their whims and personal preferences, there is no standard or reason for granting or not granting sick leave. Workers at Murata receive compensation for sick days, but only if they have a valid medical certificate, even if they are only sick for one day. The medical certificate must come from a company-approved clinic or health centre. Regular workers at MMI can take one day’s paid sick leave without a doctor’s note. Outsourced workers must provide a doctor’s note even for one day’s paid sick leave.

Workers at Namiki must send in a medical certificate each day when they take sick leave. There is a nurse’s room with a nurse on duty 24 hours a day. A physician visits twice a week for half a day. If a worker is ill, they are allowed to rest for up to one hour. If they need to go out to visit a doctor, they are only allowed to do so if they receive permission first. Workers do not have to pay medical costs. Workers can take paid sick leave for up to 30 days, and paid maternity leave up to three months (90 days) under the labour laws.

At Fujitsu if you feel ill you can take a rest for two hours, and then start working again. Or you can take sick leave, but you need a doctor’s note for this. No more than three days’ sick leave are allowed if it is not a serious sickness. The rules are much stricter if you are very ill and you need more than three days sick leave. You have to go to hospital and you need a letter from the doctor. If you take too much sick leave, it will effect your annual bonus.

**Company’s efforts**

In several factories, extra measures are taken beyond the ones reported above. At Murata, for example, workplace lighting levels are checked every day by special ‘Safety Checkers’. At Namiki, lighting and air quality are checked in the factories to ensure that they are adequate. There are health campaigns, fire escape information, and two vacuums to clean out the solder, although the vacuums are not strong enough. Namiki Company tells employees that if they have any problems or concerns, they need to inform the company. For example, workers sitting in chairs and carrying out microscope inspection work asked if the company could adjust the chairs according to the height of
The research results: Labour conditions at Thai suppliers

5.7. Health problems

At Namiki, the company is currently addressing this problem in order to relieve workers’ backaches. But on the other hand, workers at Namiki must purchase their own protective equipment, including clothes and gloves, because the company policy is to reduce overhead costs in the factories and there is competition between the factories to have the lowest overhead costs. Because of this, there is little company expenditure on protective equipment for the workers. If a factory wins the competition, the supervisor wins a special meal. The welding jobs require nose-masks, but the company does not provide them to the workers. They said that the factory has a good ventilation system which is able to remove welding pollutants, and the materials could not melt or evaporate at 320°C. The bad smells come from liquid cement, glue, and stamp ink. Microscope inspections cause short-sightedness, and motor factory workers suffer from the loud machinery. One worker asked to move because they were losing their hearing, and the office told them to wait until next year to move.

At Innovex, the factory has made no attempt to solve the worker’s health problems during the past five years. They have moved workers into rooms in which they must handle chemicals. Chairs are broken, but they have not been replaced or fixed. One worker fell off their chair because the chair slipped, and she suffered back injuries, but the chair has not been replaced or fixed.

At CKL, the union addresses the problems relating to chemicals handling repeatedly at their monthly meeting with management, but the management does not do anything about it. They say that there is no budget for this.

5.8. Work pace

At Namiki, computers are used to calculate production rates and amounts using sensors. Graphics show the number of pieces that the workers have completed. The company expects workers to be able to rotate jobs, one worker has to do two jobs. The computer sensors adjust the number of workers, depending on the quantity of the items to be produced. For example; if the expected quantity of items is reached, the computer decreases the number of workers. If the next group of workers cannot reach the target amount, the computer will increase the number of the workers to the original number. As a result, the workers have to work harder, but receive the same income. Workers suffer from bladder infections. This is due to holding their urine too long while working on the production line and not going to the toilet because of pressure to meet target goals. If there is no one to replace them on the line, they are not allowed to leave to go to the toilet. Holding their urine too long eventually leads to kidney disease.

One of the workers at Fujitsu reports that “the buyer has a lot of power”, meaning that the buyer can order a lot of products with a short delivery time, and make them work really hard to finish the work.

Workers at MMI have to work fast, and they are constantly told by the line manager that they have to work faster. This means that workers have to remove the finished pieces
before they have had enough time to cool off. If they wait until the pieces have cooled off they will not be able to reach the set targets. Only by being diligent workers can the outsourced labour have any hope of being employed regularly. As a result, some of them take amphetamines in order to work faster.

There are long queues for the food and the toilets at Western Digital. They are allowed to go to the toilet when they are working, but it takes a long time to get out of the uniform, which means they often miss their target as a result. Also if no one can take your place, you can’t go.
6. The review process with the brands and the suppliers

An individual company profile was compiled for each PC brand after the research was completed, including the research results and each company’s CSR policies, resulting in a total of eight profiles. The research results covered not only the Thai suppliers of the PC brands but also the Chinese and Philippine suppliers. Before publication the company profiles were sent to the PC brands for review.

Except for Toshiba, all PC brands responded to SOMO with suggestions for adjustments in the policy part of the company profile. Only HP provided SOMO with a detailed reaction to the field studies. From reactions of suppliers who contacted SOMO after they had received requests from different PC brands to clarify the situation as described by SOMO, we know that not only HP investigated the labour conditions at the suppliers described, but more brands did so, including Dell. Seagate received various requests for clarification from brands, and they subsequently contacted SOMO\(^{34}\) and sent the detailed reactions of their suppliers to SOMO.

SOMO described the results of the workers’ interviews in the chapter on the labour conditions. In this chapter we are reporting on the suppliers’ reactions to SOMO's company profiles.

The information from Seagate concerns the following suppliers:

- Mektec Corporation (Thailand) Ltd, with also comments on Paragon, Mektec’s subcontractor.
- MMI Precision (Thailand) Co. Ltd.
- Innovex (Thailand) Ltd.
- and LTEC Ltd.

Mektec confirmed that they supply Seagate, Hitachi GST, Fujitsu and Western Digital. The supplier relationship between Innovex and Nokia, IBM, Philips, Hitachi, Samsung (TVs), 3M, Quantum and Seagate was also confirmed. However, the information from Seagate states that the supplier relationship between MMI and Seagate ended in 2004. The one and only MMI factory supplying parts to Seagate is MPM Technology (Thailand) which is only performing machining and inspection of HDD base plate. However, the MMI workers who were interviewed produce the metal cases for HDD’s main client Seagate. LTEC did not want to confirm the supplier relations because that is confidential information, but Seagate did confirm this relationship.

\(^{34}\) Conference call SOMO – Seagate, February 21 2007. For Seagate Sara Broadbent, Executive Director Seagate Technology, and Shanmugabalan Shanmuganathan (Balan), for SOMO Irene Schipper and Esther de Haan.
The information received by Hewlett-Packard (HP) concerns the following suppliers:

- Fujitsu (Thailand)
- Mektec (as supplier of Fujitsu)
- Hitachi GST (management interview by SOMO but no workers interviews).
- Samsung Thailand (not included in SOMO’s research)
- Seagate/Maxtor, and via Seagate the second-tier suppliers Innovex, LTEC (Fujikura subsidiary), Mektec, Paragon, and MMI.
- Western Digital
- Delta Electronics (Thailand).

HP has followed up on the report and is, according to HP, now actively working with its first-tier suppliers in Thailand to schedule audits at their facilities to specifically review and address the issues identified in the (SOMO) report. The audits will take place in the first half of 2007. HP has also suggested that the suppliers conduct third party external audits or include HP in the audits of their sub-tier supplier facilities. The research has led to the following actions:

- Fujitsu Thailand will be audited in 2007
- HP met with Fujitsu executives in Japan and raised the issue
- Fujitsu Thailand immediately checked its supplier Mektec
- Fujitsu’s plan of action includes a further review of the allegations (in the SOMO report) and a HP SER audit.
- Hitachi GST Thailand will be audited in 2007.
- HP met with Hitachi GST executives in Japan and raised the issue. Hitachi GST did make clear that they are concerned about the working conditions of its suppliers. As a result Hitachi GST will address its first-tier suppliers in 2007 through a rigorous supply chain programme that will request implementation of CSR standards.
- Samsung Thailand will be audited in 2007.
- HP met with Samsung executives in Korea and raised the issue.
- Seagate responded to HP and contacted its suppliers Innovex, LTEC, Mektec, Paragon and MMI.
- Seagate Thailand will be audited in 2007.
- Western Digital Thailand will be audited in 2007.
- Delta Electronics Thailand was audited in 2004 and 2006, and will be re-audited in 2007.
- Delta Electronics is setting up a CSR team (January 2007) to audit and help their suppliers on CSR issues.
- And Delta Electronics will make further improvements to the exhaust and circulation system for soldering fumes and reduce smells in the cooler fan factory within the next two months.

---

6.1. Code of Conduct and buyer monitoring

In response to the various allegations all suppliers replied repeatedly that they are in compliance with Thai labour law and local regulations. None of them in their response to the SOMO profiles referred to the Electronics Industry Code of Conduct. Only Fujitsu did and also referred to the HP SER program. Seagate\textsuperscript{36} in their response to SOMO mentioned that they have sent the EICC code to all its suppliers\textsuperscript{37}.

The suppliers mentioned international standards in their responses to the SOMO profiles, such as the ISO standards (OSHAS 18001, ISO 14001 and ISO 90001) and some mentioned their own Code of Conduct (The Fujitsu Way, the Hitachi Group CSR policy, etc). Also, Delta mentioned its own CSR policy, which is very similar to programmes of major buyers, and they also commented that workers are aware of this policy. LTEC distributes a Code of Conduct Booklet and organises employee meetings to learn about the Code. Paragon’s and Mektec’s Code of Conduct is “stated” to new employees. MMI (MPMT) has company policies and work rules based on the Thai labour law. Innovex has “written policies”. According to Innovex, it is quite logical that buyers never speak to workers because “very few of the production workers speak English”. \textsuperscript{38}

6.2. Labour Relations

Relating to freedom of association it was quite striking in the responses of the different suppliers that they described their policy and general methods without responding to the specific situations as described in SOMO’s company profiles. For example Paragon did not respond to the allegation that workers are not allowed to talk with more than five persons together but commented instead that workers have different ways of communicating their comments and opinions to management: meetings, activities, parties. So “all levels of employees can easily communicate to management, staff, especially top management”. \textsuperscript{39}

Mektec responded that it always encourages its employees to express their opinions regarding their work and has also set up a complaint procedure. MMI (MPMT) said it is non-unionised because it is a relatively new factory. In reply to the massive lay-off of union members MMI (MMIT) stated that not all union member were laid off; the chair of the union for example is still employed and “ample opportunities and space are allocated for union activities and staff are free to participate”. Western Digital responded that workers are free to form a union and they do not discourage employees from forming a union. Western

\textsuperscript{36} Seagate Corrections/Comments on the SOMO Report’, received by email 16 February 2007 from Sara Broadbent, Executive Director Seagate Technology
\textsuperscript{37} None of the workers, as described in the part on labour conditions, has ever seen a Code of Conduct. Seagate Corrections/Comments on the SOMO Report’, received by email 16 February 2007 from Sara Broadbent, Executive Director Seagate Technology
\textsuperscript{38} Status of Hewlett-Packard follow-up with Suppliers in the SOMO report, February 25, 2007, received by email from HP
Digital is not unionised but has a “welfare committee”; at each factory location an elected body of employees represents the workers. In addition, hotlines are available for employees to call in complaints, as well as HR web sites and suggestion boxes. Innovex responded that four times per year every employee is given the opportunity to submit questions or complaints and every submission is answered. LTEC confirmed it has a safety committee but no union, however it objected to the remark that most of the representatives belong to the management.

6.3. Discrimination

The suppliers objected to the statement that contract workers face discrimination related to salary, pregnancy, union membership, free provision of PPE, and health checks. Delta and MMI responded that their contract workers are hired through labour agencies and that they therefore do not know all details. They have no knowledge, they noted, of the fact that pregnancy tests are required and have to be paid for by the workers (Delta Electronics, MMI). In this way responsibility is shifted to the labour agencies.

MMI (MPMT) responded to the allegation that contract workers receive less benefits and salary with the statement that the contract workforce is only 40% of the total workforce and the conditions are in line with Thai labour law’s requirements. Their basic salary, average gross income, other general welfare and benefits, including working environment, are similar to regular staff. Because the regular staff has been with the company for more than 10 years their salary is higher than that of new recruits.

Western Digital responded that it is an equal opportunity employer and does not discriminate on the basis of gender, pregnancy, or any related medical conditions. In Western Digital's factories, urine tests are performed on all employees, both male and female, and both direct employees and sub-contracted employees, to check for narcotic substance abuse only.

Pregnancy

Western Digital is not aware of any lawsuit filed by a Thai labour organisation relating to termination due to pregnancy. Western Digital provides appropriate working conditions for pregnant operators.

---

40 According to labour organisations in Thailand, Workers Welfare Committees are ineffective in protecting workers’ rights because of several legal constraints. Unlike for union leaders, there is no legal protection for any retaliation against any committee members; as a result committee members do not dare to actually do anything. Secondly, almost all Welfare Committees are management appointed, sometimes with a legitimising election effort. Welfare Committees does not represent any meaningful Freedom of Association.

41 Which would lead to the conclusion that the company is now only hiring contract workers and no worker becomes permanent anymore
6.4. Wages

All suppliers responded that the wages are in compliance with the Thai labour Law. To the allegation that the wage is not a living wage LTEC replied that the minimum wage is periodically reviewed and adjusted by the Wage Committee and that it is considered as appropriate and acceptable by the government, employers and employees.42

Innovex’s response relating to wages was that they pay daily employees according to Thai labour law. In fact, as of 15 Dec 2006, 93% of all Innovex daily employees are paid more than the required minimum wage. And it is not company policy to force workers to take holidays when there is no work – shutdowns (August 2006 and December 2006) were announced well in advance, employees were paid half their daily wages and given the option of supplementing that pay by taking annual leave for the other half of the day.

6.5. Working hours

It is clear that daily overtime is normal for Thai suppliers. But they all state that it concerns voluntary overtime and that it will not exceed 36 hours per week as limited by the Thai labour Law. The national law is the leading standard in this, which allows a maximum workweek of 84 hours in total. To adhere to a working week that could be 48 regular hours plus max. 36 hours overtime, can be called extreme and against all international standards. Not one supplier pursued compliance with international (ILO) standards in this respect or referred to the EICC code or own Company Codes of Conduct.

Mektec mentioned that for the production workers regular working hours are 7 hours per day. “Should there be any overtime in each day; Mektec would allow its employees to volunteer to work in overtime. Mektec also makes sure that within one week, including their day off or any holidays, overtime would not exceed 36 hours per week. This is enforced by Thai labour law”.

Paragon Electronics has a three-shift system with 7-hour work, 6 day per week. “Volunteered overtime on weekdays is 3.5 hours per day” and “volunteered overtime on holidays is 7 hours per day. This does not exceed the 36-hour of overtime work for a week”. MMI did not object to the number of working hours as stated by the workers (12 hours per day and 324 hours per month), however it replied that overtime is performed only with the consent of its staff.

LTEC replied that employees who wish to work overtime inform LTEC of their wishes at the beginning of each work day. An LTEC working day is 8 hours per day, plus OT 2.5 hours per day and LTEC adjusts the working schedule to avoid 7 working days in a row. LTEC ensures that the number of working hours does not exceed the 36 hours per week as limited by Thai labour law.

---

But as the US report cited before indicated: employees are often not represented here

Holidays include Sundays
“All overtime worked at Western Digital is strictly voluntary and adheres to all labour law requirements with respect to both hours worked and overtime pay. Western Digital does not retaliate against employees who do not work overtime. Western Digital does, at times, offer additional incentive bonuses to individuals for working overtime. The standard work day for Western Digital’s factory employees is 4 days, 12 hours each day, followed by 2 days off. Therefore, a normal shift per 7-day work week includes 42.5 hours standard time and 17.5 Hrs overtime”.

6.6. Targets explained by suppliers

Paragon replied that bonus payment is based on company performance and attendance but not on individual production targets. MMIT responded that workers’ performance based on targets was developed by industrial Engineers and is within stipulated standards.

LITEC responded that it has stretched targets to allow workers to receive more money when the company profit goals are met. Incentive bonuses are paid on company performance and normal pay is not impacted by the bonus programme.

6.7. Health and Safety

Work accidents

MMI has no report of medical records of the mentioned OHS related disease or the fork lift incident where a man broke his legs. MMIT has an in-house Safety Committee and a certified safety officer.

Health problems

As for Environmental Monitoring including air, light, noise and any other pollution, Mektec makes sure that it complies with standards and they are audited by third parties.

In response to the statement that workers suffer from fatigued eyes and headaches from working with magnifying lenses all day, Innovex stated that employee health conditions are monitored regularly. Innovex recognizes the potential hazards associated with microscope work and has complied with or exceeded all safety standards. With respect to the Borik acid use, Innovex stated that it provided PPE and that they were recently audited by BVQI and certified OSHAS 18001.

Delta Electronics concluded that apparently some workers are still concerned about their health, which they do understand, and they will improve their communications with them to better understand their concerns. Delta: ‘Note that we are certified with ISO14001 and OHSAS 18001. We will make further improvements to the exhaust and circulation system for soldering fumes and reduce smells in the cooler fan factory within the next 2 months. The plan is to increase fresh air intake from 20% to 25%, adjust the number of air handling units in the assembly line and injection area for better air circulation and add 1 exhaust unit of 30k CFM with 8 additional exhaust outlets to reduce the smell in the working area.’
Safety problems

In response to the extreme H&S problems as described by the workers of MMI, MMI (MMIT) stated that the working environment is regularly checked by the Thai authorities with no major discrepancies, the staff receives regular check-ups and so far there are no reports of health problems, appropriate PPE (personal protective equipment) is provided and the use of it is mandatory. Cranes are used for heavy duty work (moulds). The fire exercise passed the stipulated requirements with no discrepancy, MMIT is in full compliance with Thai labour law. Thick gloves are provided for handling hot work.

6.8. Work pace

In response to the allegation of harsh treatment Paragon replied that yelling and shouting are not the way within Paragon: “We do have many other ways to encourage workers through weekly meetings. There are also weekly meetings with supervisors to enhance workers’ attitude and guide them to work happily and effectively at Paragon.”

In response to the reported harsh treatment at Mektec where workers have to meet excessively high and often changing targets, Mektec stated that it set the targets with careful consideration and they have exceeded their targets every year and they can prove that. They also stated that yelling is not the practice within Mektec; that Mektec has many other ways to encourage the workers to work harder, such as the Quality Circle Committee activities.

---

44 Following the inspection visits, the workers were surprised that the authorities did not report on the arduous health and safety problems.
7. Conclusions

From the research done by SOMO on the electronics industry in Thailand, a picture emerges of workers working long hours, for very little payment, with insufficient health and safety protection. They have little means to improve their conditions as in most factories the organisation of workers is obstructed and in the factories where there are unions, they often have little power. The Thai labour law offers not enough protection to the workers and is not sufficiently enforced; labour inspection has hardly any resources.

This is confirmed by a report from the US Labour Department from March 2006 which states that the law provides inadequate protection to workers who participate in union activities, employers often discriminate against workers seeking to organise unions and collective bargaining agreements are few. The report further mentions the inadequacy of the minimum wage increase in the year 2005, which did not keep pace with inflation and did not provide a decent standard of living for a family. They acknowledge the increasing use of labour brokerage firms that use a "contract labour system" through which workers are discriminated by means of wages and benefits and that causes the workers to lack the ability to bargain collectively. They further register the occurrence of employees being forced to work overtime with punishments and dismissals for those who refuse.

It became clear from the labour conditions described by the workers that the suppliers' policies and regulations are not always being put into practice. The buyers' policies, mostly stated in Codes of Conduct like the EICC code, are not being referred to by the suppliers and are unknown to the workers. After SOMO sent them the company profiles, some of the brands responded by auditing the mentioned suppliers and followed up on parts of the allegations. There is however no involvement of local stakeholders in the monitoring, auditing and remediation processes.

SOMO will continue to discuss the research findings and review process with local stakeholders, including NGOs, Trade Unions and suppliers in several meetings in Thailand in May 2007.

---

Addendum
HP is taking the reported allegations by SOMO very seriously and investigating each of the suppliers involved determining appropriate actions. Upon HP’s receipt of the SOMO report, HP immediately contacted the hard disc drive suppliers. HP requested they respond to the allegations of labor, health, and safety violations at their facility and/or those of their suppliers. In addition, we outlined several specific actions we expected these suppliers to take:

- Review and verify the supplier information and allegations.
- Respond with an action plan to the Labor and health and safety issues associated directly with the company’s manufacturing sites.
- Respond with a plan on how the company will work with their suppliers to fully investigate the allegations and report the findings to HP within the next 2 months
- Set up active verification (audits) at their supplier’s sites (may include HP or 3rd party auditors).
- Plan for HP to audit their manufacturing site within the first half of FY07.

HP’s first-tier suppliers have provided an initial response and are in the process of confirming their relationships with the sub-tier suppliers in their supply chain. We have also received responses from some of the sub-tier suppliers. HP’s procurement management also met in person with the executives of Hitachi, Fujitsu, and Toshiba in Japan and Samsung in Korea and discussed the SOMO allegations and reminded them of HP’s SER requirements. We asked that they ensure these allegations are immediately investigated by their company.

HP is now actively working with these suppliers to schedule audits at their facilities to specifically review and address the issues identified in the report. The audits will take place within the next few months. HP
has also suggested that the suppliers conduct either 3rd party external audits or include HP in the audits of their sub-tier supplier facilities.

In an outsourced environment, HP acknowledges the challenges of assuring conformance with the Electronic Code of Conduct. Although we have communicated our SER requirements to our suppliers under direct contract and have conducted onsite audits at many of their facilities, we do not have the same control and visibility to our sub-tier suppliers that are not directly selected and managed by HP. Some of the implementation challenges we face in HP’s supply chain SER program are:

- Still in the educational phase with our direct supplier base
- Some improvements to nonconformances are made after audits, but not yet ingrained in the culture and most suppliers require re-assessments and ongoing follow-up for continuous improvement
- Many suppliers do not have a formal supplier management program to pass on SER requirements to sub-tier suppliers (they are just in the beginning stages of their own CSR-related programs)
- HP still has internal gaps to fill in ensuring procurement personnel and auditors are following up with suppliers on corrective action plans, progress and feedback

Although we have challenges, HP is committed to ensuring our suppliers are meeting our Code expectations and are making long-term sustainable change. HP acknowledges the importance of CSR both within the company, in our supply chain, and among the entire industry. HP will keep SOMO informed of our progress and results.
Status of Hewlett-Packard follow-up with Suppliers in the SOMO Report

February 25, 2007

HP has reviewed the draft SOMO report dated February 22, 2007 and has some follow up comments and suggestions for changes which we have included in the .pdf file. We have had the opportunity to review the relationships of these suppliers and sub-tier suppliers and have found that a few of these suppliers are not in our supply chain. We are requesting that these suppliers be removed from HP’s profile and research. In addition, we are including responses we have received to the allegations directly from our suppliers. The SOMO draft report includes responses from some of these suppliers already. We have provided additional supplier responses that should also be included for completeness.

HP is now actively working with our 1st tier suppliers to schedule audits at their facilities to specifically review and address the issues identified in the report. The audits will take place within the next few months. HP has also suggested that the suppliers conduct either 3rd party external audits or include HP in the audits of their sub-tier supplier facilities.

Although we have challenges, HP is committed to ensuring our suppliers are meeting our Code expectations and are making long-term sustainable change. HP acknowledges the importance of CSR both within the company, in our supply chain, and among the entire industry.
Confirmation of Supplier Responses and Sub-Tier Supplier Relationships in Thailand:

**HDD Suppliers:**

<table>
<thead>
<tr>
<th>Supplier</th>
<th>Action to Date / Comments</th>
<th>HP Audit Summary</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fujitsu</td>
<td>There are allegations related to Fujitsu’s Thailand facility.</td>
<td>Fujitsu Thailand will be audited in 2007</td>
</tr>
<tr>
<td></td>
<td>Fujitsu responded to HP 1/19/07</td>
<td></td>
</tr>
<tr>
<td></td>
<td>HP met with Fujitsu executives in Japan wk of 1/22 and raised issue</td>
<td></td>
</tr>
<tr>
<td>Fujitsu Suppliers</td>
<td></td>
<td></td>
</tr>
<tr>
<td>LTEC</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Mektec</td>
<td>According to Fujitsu: only Mektek is a current supplier to Fujitsu.</td>
<td></td>
</tr>
<tr>
<td>Paragon</td>
<td></td>
<td></td>
</tr>
<tr>
<td>MMI</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**Allegations in SOMO report related to Fujitsu:**

7.1.1. **Discrimination and Unequal Treatment of Contract Workers**

At Fujitsu, when female workers apply for a job they have to take a urine/pregnancy test and when contract workers get pregnant they will be fired.

**Freedom of Association and the Right to Collective Bargaining**

At present there is no labour union at the Fujitsu Thailand factory. Workers indicate that in the past the company actively discouraged the formation of a trade union but this is less the case now. Nonetheless, workers feel that setting up a union is not possible.
Wages and Overtime Payment
At Fujitsu, they stated that their wage is not a living wage because it is simply not enough to cover their living expenditures.

Excessive Working Hours and Intensive Production Rhythms
In most cases the number of hours by far exceed the ILO (48+12) maximum number of working hours. Moreover, in many factories overtime is compulsory. Labourers stated that if they refused to work overtime without a very good reason they are put on a black list and receive warnings. After three warnings there is a chance you will be dismissed. In addition, it was reported that in case overtime is refused, the annual bonus is deducted, salary is cut or wage increases are not followed up.

Health and Safety Conditions
Allergic reactions to the soap used for everyday cleaning before going into the clean-room.

Awareness of Code of Conduct and Audits
In none of the factories workers were aware of the code of conduct of HP, or the EICC.

Fujitsu’s Response:
Our initial findings indicate that Fujitsu's facilities and the facilities of our suppliers are in compliance with local laws and regulations. Among the list of alleged suppliers by SOMO, only Mektek is a current supplier to Fujitsu.

Fujitsu checked with Mektek immediately and received their response letter as attached. Mektek verified and confirmed that its labor practices are in conformance with local laws and regulations.

Regarding the allegations in the report related to the Fujitsu manufacturing facility, investigation is underway with the intent to verify and take appropriate corrective action.
Going forward our plan of action includes further review of the allegations and SER audits as appropriate. Our target completion date for these activities is March 9, 2007. Upon completion of our audits Fujitsu will provide a complete report of our findings.

Fujitsu Storage Products Group is committed to HP’s SER and the Electronic Industry Code of Conduct (EICC). In accordance with Fujitsu Group corporate policy, the Fujitsu Storage Division and its factories comply with the "Fujitsu Way". Fujitsu Way is Fujitsu’s Corporate Social Responsibility Code and is available at http: www.Fujitsu.com/global/about/procurement/policy.

All suppliers are provided access and requested to comply with the Fujitsu Way.

Mektec’s Response:

Mektec Manufacturing Corporation (Thailand) Ltd. is located at Bangpa-In Industrial Estate and Hitech Industrial Estate in Ayutthaya province. There are a total of 3719 employees (578 staffs and 3141 workers) being employed as of November 2006.

Mektec operates according to international standards in terms of Quality, Environmental and Safety. Mektec also abides by laws, especially those established by the Thai Government.

The company has policies to oversee the safety of its employees, assets, and important information. To do so, we have established some rules to control the entry and exit of employees, assets and visitors.

Mektec always encourages its employees to express their opinions regarding to their works. The company also setups a system for their employees to express their concerns or complaints through several activities. Furthermore, Mektec allows its employees to express their abilities through activities such as QCC and several other Improvement Projects.

As for working conditions of production workers, regular working hour is 7 hours per day. Should there be any overtime in each day; Mektec would allow its employees to volunteer to work in overtime. Mektec also makes sure that within one week, including their day off or
any holidays, overtime would not exceed 36 hours per week. This is enforced by Thai Labor Law.

Mektec encourages 2-way communications. Information will be passed on from Management Team to staffs and workers, and also from staffs and workers back to Management Team. Management meetings are held weekly, while company meetings for all employees are held monthly.

On Health and Safety issues, Mektec operates according to laws and policies set to comply with OSHA 18001 (Occupational Health and Safety Management System). Mektec focuses on prevention and corrective actions when any cases occur. Currently, Mektec never has accidents that cause employee to be absent from work for more than 600 days.

As for Environmental Monitoring including air, light, noise and any other pollution, Mektec makes sure that it complies with standards and we are being audited by third parties.

Company’s Code of Conduct is stated in the company handbook which was given out and interpreted during the 14-day orientation to each and every employee when they start working at Mektec.

<table>
<thead>
<tr>
<th>Supplier</th>
<th>Action to Date / Comments</th>
<th>HP Audit Summary</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hitachi Global Storage (HGST)</td>
<td>No allegations related specifically to HGST facilities. HGST responded to HP 1/19/07 HP met with HGST executives in Japan wk of 1/22 and raised issue.</td>
<td>HGST Thailand and Philippines will be audited in 2007.</td>
</tr>
<tr>
<td>Hitachi Suppliers</td>
<td>Per HGST: Only suppliers used by HGST are Mektec and San Technology.</td>
<td></td>
</tr>
<tr>
<td>Innovex</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Mektec</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Paragon</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Murata</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Allegations in SOMO report related to HGST:</td>
<td></td>
<td></td>
</tr>
<tr>
<td>--------------------------------------------</td>
<td></td>
<td></td>
</tr>
<tr>
<td>No allegations related specifically to HGST facilities found in the report.</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>HGST's response to HP:</th>
</tr>
</thead>
<tbody>
<tr>
<td>In response to the Hitachi Global Storage Technologies (“Hitachi GST”) excerpts contained in the SOMO report, Hitachi GST has received a copy of that excerpted report and is looking into the matter. Regarding Hitachi GST companies called out in the SOMO report, Hitachi GST does not permit involuntary labor under any circumstances. Security personnel are on site for the purpose of protecting company assets and the safety of our employees. Regarding the suppliers named in the excerpted report, Hitachi GST is carefully evaluating the allegations made by SOMO and will take action as appropriate based on the Hitachi Group Procurement guidelines described directly hereunder.</td>
</tr>
</tbody>
</table>

| Hitachi GST is a wholly owned subsidiary of Hitachi, Ltd, and therefore is a member of the Hitachi Group of companies. For your reference, please find attached a copy of the Hitachi Group CSR Policy (“CSR Policy”) as well as a letter from Hitachi, Ltd. Corporate Procurement describing CSR expectations of Hitachi Group suppliers. Hitachi Group companies will evaluate their suppliers against the CSR Policy. In addition, Hitachi Group companies communicate the expectation to suppliers that: (1) they operate according to the principles of the CSR Policy, and (2) they extend the same principles to their first and second tier suppliers. |

| Hitachi GST is concerned about the working conditions of its suppliers. As a result, Hitachi GST will address its first tier suppliers in 2007 through a rigorous sustainable supply chain program that will request implementation of CSR (social and environmental) standards of conduct that are consistent with the principles of Hitachi’s CSR Policy, as well as the EICC and the UN Global Compact. Hitachi GST suppliers will also be evaluated and audited against the Hitachi GST supplier code of conduct to assure consistency with CSR principles such as health and safety, ethics, labor standards, human rights and environmental conservation. |

<p>| Hitachi GST does not directly manage the suppliers Mektec in Thailand and thus has not conducted audits of their working conditions. |</p>
<table>
<thead>
<tr>
<th>Supplier</th>
<th>Action to Date / Comments</th>
<th>HP Audit Summary</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Samsung</strong></td>
<td>No allegations related specifically to Samsung facilities.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Samsung responded to HP 1/19/07</td>
<td></td>
</tr>
<tr>
<td></td>
<td>HP met Samsung executives in Korea wk of 1/22 and raised issue.</td>
<td></td>
</tr>
<tr>
<td><strong>Samsung Suppliers:</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Innovex</td>
<td>Not a Samsung supplier</td>
<td></td>
</tr>
<tr>
<td><strong>Allegations in SOMO report related to Samsung:</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>No allegations related specifically to Samsung facilities found in the report.</td>
<td></td>
</tr>
<tr>
<td><strong>Seagate-Maxtor</strong></td>
<td>No allegations related specifically to Seagate facilities.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Seagate responded to HP 1/17</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Seagate contacted their suppliers</td>
<td></td>
</tr>
<tr>
<td><strong>Seagate Suppliers:</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Innovex</td>
<td>Confirmed, Responded 1/18/07</td>
<td></td>
</tr>
<tr>
<td>LTEC</td>
<td>Confirmed, Responded 12/18/06</td>
<td></td>
</tr>
<tr>
<td>Mektec</td>
<td>Confirmed, Responded</td>
<td></td>
</tr>
<tr>
<td>Paragon</td>
<td>Confirmed, Responded</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Seagate Singapore was audited in 2004 and will be re-audited in 2007. No major nonconformances.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Seagate Thailand will be audited in 2007.</td>
<td></td>
</tr>
</tbody>
</table>
| MMI          | 1/26/07 Confirmed, Responded
|             | 12/21/06 Confirmed, Responded |

**Allegations in SOMO report related to Seagate/Maxtor:**
No allegations related specifically to Seagate/Maxtor facilities found in the report.

Seagate’s suppliers have provided responses to Seagate and they are below:

**Innovex’s Response:**

**Labor:**
1. **SOMO Inquiry:** wage is not enough to cover the cost of living
   **Innovex Response:** Innovex pays daily employees according to Thai Labor Law. *In fact, as of 15 Dec 2006, 93% of all Innovex daily employees are paid higher than the required minimum wage. In addition to the base pay, employees receive transportation allowance, meal allowance, perfect attendance rewards.*

2. **SOMO Inquiry:** forced to work overtime in order to earn additional income to cover basic expenditures
   **Innovex Response:** As noted above, Innovex pays higher than the Thai minimum wage.

3. **SOMO Inquiry:** company’s policy to compensate workers during regular workdays forces workers to take holiday when there is no work - it regularly happens that workers show up at the factory but sent home again and told they have to use one of their rest days
   **Innovex Response:** This is not Innovex practice. Over the past two and a half years, we have had two shutdowns (one in August 2006 and one upcoming in December 2006). Both of these were announced well in advance, employees were paid half their daily wages and given the option of supplementing that pay by taking annual leave for the other half of the day.
4. SOMO Inquiry: ill workers are allowed to rest for two hours- if they need longer they have to take a sick day and lose their daily pay benefits
Innovex response: Sick Employees are allowed to rest until they have recovered. They are paid for sick days at a maximum of 30 days per year according to Thai Labor Law.

H&S:
5. SOMO Inquiry: workers suffer from fatigued eyes and headaches from working with magnifying lenses all day long -One worker said that workers “have swollen red eyes that look like they have stung by wasps and the have to stop working for a week to recover.”
Innovex response: Employee health conditions are monitored regularly. Innovex recognizes the potential hazards associated with microscope work and has complied with or exceeded all safety standards. Nurses are on duty 24 hours

6. SOMO Inquiry: sufficient fire equipment at the factory but to conserve electricity the lights close to the fire exit are largely dimmed
Innovex response: Innovex focuses on safety of the employees. We were just audited by BVQI (ISO certification agency) and certified for OHSAS 18001. We also conduct fire drills with audits from outside agencies.

7. SOMO Inquiry: insufficient toilets and workers must wait in line
Innovex response: Innovex has 109 toilets which are more than required by Ministry of Labor.

8. SOMO Inquiry: workers complain about the canteen
Innovex response: Innovex consistently reacts to feedback about the canteen. There is an official canteen committee with the mission of identifying projects to improve the canteen. The management team fully supports their efforts.

9. SOMO Inquiry: workers report they are exposed to certain chemicals (including Boric Acid) because of limited protective gear.
Innovex response: Innovex provides personal protective equipment for every employees working with chemicals. We conduct regular internal audits and, as noted, were recently audited by BVQI (ISO certification agency) and certified for OHSAS 18001.

**LTEC’s (Fujikura subsidiary) Response is attached:**

C:\Documents and Settings\lridgewa\Desktop\SACOM_SOMO REPORTS\SOMO\Seagate response documents\LTEC, Fujikura Response to Seagate_061218.pdf

**Mektec’s Response – See response under Fujitsu above.**

**Paragon – See response under Western Digital below.**

**MMI’s Response:**
The one and only MMI’s factory in Thailand that is supplying parts to Seagate is **MPM Technology (Thailand) Co. Ltd** which was incorporated in July 2005. We call this company ‘MPMT’. Since the day of incorporation of MPMT in July 2005, there wasn’t any audit conducted by SOMO.

In MPMT, security check for all staff in and out of MPMT’s factory is necessary, just like most companies practice anywhere in the world, if staff need to come into company’s premises of official matter even after their normal working hours are allowed to do so as long as they register at the security guard.

Overtime are performed only with the consent of our staff, we do not force our staff to work overtime if they do not agree to do so for whatever reasons that they may have.

MPMT’s contract workforce is only about 40% of our total workforce, our term and conditions with our contract workers are in line with the Thailand Labor’s requirements. Their basic salary, average gross income other general welfare and benefits including working
environment are similar to our regular staff.

Being a relatively new factory, MPMT is non-unionized, all our staff; be it regular or contract workers are paid with the basic salary at least equal or better than basic minimum basic salary required by Thailand’s labour law.

MPMT’s factory only perform machining & inspection of HDD baseplate under fully air-condition environment except for store for all staff including contract workers, There is no hot casting and aluminum dust in our working environment, we send our staff for regular yearly check up and so far, there is no report of health problem due to working in MPMT.

<table>
<thead>
<tr>
<th>Supplier</th>
<th>Action to Date / Comments</th>
<th>HP Audit Summary</th>
</tr>
</thead>
<tbody>
<tr>
<td>Western Digital</td>
<td>There are allegations related to WD Thailand facility.</td>
<td>WD Thailand will be audited in 2007.</td>
</tr>
<tr>
<td></td>
<td>Western Digital responded to HP 1/19/07</td>
<td></td>
</tr>
<tr>
<td>WD Suppliers:</td>
<td>Confirmed, Responded</td>
<td></td>
</tr>
<tr>
<td>Mektec</td>
<td>Confirmed, Responded</td>
<td></td>
</tr>
<tr>
<td>Paragon</td>
<td>1/26/07</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Confirmed, Responded</td>
<td></td>
</tr>
<tr>
<td></td>
<td>1/26/07</td>
<td></td>
</tr>
</tbody>
</table>

Allegations in SOMO report related to Western Digital:

**Discrimination and Unequal Treatment of Contract Workers**

A number of unequal treatment or discrimination cases were found, mainly relating to contract workers. in Western Digital 60 percent are agency hired. In some cases contract workers were denied certain bonuses. The hiring agency requires the female candidates to take a urine test, which is very likely used to determine pregnancy. This is confirmed by the fact that one of the workers was dismissed after she
got pregnant. Only after a lawsuit, filled by CLIST, the worker could return to the factory as a subcontracted worker.

**WD Response:**
Western Digital is an equal opportunity employer and does not discriminate on the basis of gender, pregnancy, or any related medical conditions. In Western Digital's factories, urine tests are performed on all employees, both male and female, and both direct employees and sub-contracted employees, only to check for narcotic substance abuse. Western Digital insists that all agencies used to hire subcontracted workers adhere to Western Digital's strict hiring policies against any form of discrimination and require all such agencies comply with all labor laws. Western Digital provides appropriate working conditions for pregnant operators, including temporary changes in assignment during pre-delivery, and provides specialized maternity training. Western Digital also provides full time nurses in each site for employees who need medical attention. Western Digital is not aware of any lawsuit filed by CLIST relating to termination.

**Freedom of Association and the Right to Collective Bargaining**
There is no union at Western Digital Thailand. Workers are afraid they will lose their jobs when they start forming a union.

**WD Response:**
Western Digital complies with all applicable labor laws and does not discourage employees from forming a union. Workers are free to form a union at any time. Western Digital is currently not unionized, but does utilize a process called the “welfare committee” where an elected body of employees at each factory location represent the mass population for a duration of 2 years. The Welfare committee organization chart is posted on the company bulletin board for employee information and clearly communicates how to contact the representatives. The committee meets a minimum of once per quarter and consists of up to 18 employee representatives. The committee reviews the comments and suggestions raised by the representatives concerning the employees’ welfare at the quarterly meetings. In
addition, ethics hotlines are available for employee use, HR web sites (E-suggestions) and suggestion boxes are also available where complaints may be registered anonymously.

**Wages and Overtime Payment**

In **Western Digital** the bonus is reduced in case of sickness. In a number of factories, workers also reported a number of excessive wage deductions.

**WD Response:**

SOMO's description of Western Digital's attendance bonus is inaccurate. Western Digital has many different bonus programs to motivate and reward employees at all levels. For example, in Thailand all employees are entitled to a "13th month" guaranteed bonus that is not tied to attendance, and there is a "14th month" bonus program that varies based on company performance and is not tied to attendance. WD also utilizes a common practice referred to as an attendance incentive that is payable to employees to minimize absenteeism. A bonus payment is made if during a two-week pay period the employee has not had an unexcused absence. The incentive increases 50 Baht, or $1.40 every consecutive pay period there are no unexcused absences, up to a cap at pay period seven. If an employee has an unexcused absence, the incentive starts over at pay period one and the employee restarts the process.

**Excessive Working Hours and Intensive Production Rhythms**

In all the factories, a few hours overtime per day is standard practice and in most cases the number of hours by far exceed the ILO (48+12) maximum number of working hours. Moreover, in many factories overtime is compulsory. At Western Digital workers indicate that supervisors threaten them with dismissal if they do not accept the overtime work. With 12-hour shifts, 7 days a week during peak season (which lasts 10 months a year according to workers) working hours in this factory are particularly excessive and unreasonable.

**WD Response:**
All overtime worked at Western Digital is strictly voluntary and adheres to all labor law requirements with respect to both hours worked and overtime pay. Western Digital does not retaliate against employees who do not work overtime. Western Digital does, at times, offer additional incentive bonuses to individuals for working overtime. The standard work day for WD’s factory employees is 4 days, 12 hours each day, followed by 2 days off. Therefore, a normal shift per 7 day work week includes 42.5 hours standard time and 17.5 Hrs overtime. This schedule is explained to the employees prior to commencing employment with WD. As stated above, all overtime work is strictly voluntary and complies with applicable labor laws.

**Health and Safety Conditions**

In Western Digital the main H&S problems mentioned are aluminium dust, noise.

**WD Response:**

SOMO’s description of the health and safety conditions at Western Digital's factories is inaccurate. Western Digital has high EH&S standards at all of its facilities. Western Digital facilities are 100% temperature controlled in all locations, excluding freight operations, to ensure the comfort and safety of our employees. Within each facility there are temperature, humidity and particulate controlled Clean Rooms where a large number of employees work. Those clean rooms operate at a Class 100 particulate environment, controlled temperature of 20+/- 3 (17-23) Celsius and humidity control of 55% to 80% RH. The temperature is set to ensure the comfort level of the employee working inside the clean room as they have to wear the jump suit at all times to prevent contamination and ESD - critical to the product quality and reliability. No smell or dust is allowed in the clean room area as that would lead to product contamination.

1. Aluminum dust is not present and it is not generated in our manufacturing process. It has never been a Health and Safety problem for the company.
2. There is a noise level monitor in the parts washing room which indicates an average of 78 dB per 8 continuous working hours.
WD provides ear muffs for ear protection for our employees that desire such protection. WD also requires that any employees that work in areas where the noise level exceeds the applicable legal threshold wear ear muff protection.

3. The temperature inside the Clean Room area is regulated to 20+/−3 (17-23) Celsius and has a particulate control of <100, 0.5 micro-inch particles per cubic feet of air flow. This is cleaner than an operating room in a hospital.

4. No chemical mixing is performed in the production clean rooms. Assembly tooling is cleaned on a once per shift basis using a mixture of Water and IPA (Isopropyl Alcohol). During the cleaning operations the operators where (Nitrile) gloves and face masks which is required protection for all clean room personnel and prevents direct contact of the IPA to worker's skin. No other chemicals are used in production of Disk Drives during assembly. In other parts of our facility outside the clean rooms, any chemicals used are handled properly with trained personnel and necessary precautions to avoid harmful effects.

**Awareness of Code of Conduct and Audits**

In none of the factories workers were aware of the code of conduct of HP, the EICC or any of the other suppliers.

**WD Response:**
Several companies in addition to HP have performed audits at WD's factories and none of those audits have resulted in finding any issues of non-compliance with applicable laws. Western Digital from time to time hires independent auditors to perform surveys on employee welfare issues and such audits have not resulted in finding any issues of non-compliance with applicable laws. All WD Purchase Orders used to purchase goods or services from other companies clearly state that all suppliers must comply with local labor standards and labor laws including Health and Safety and the environment. In addition, Western Digital regularly audits the materials used in our products by utilizing independent laboratories to validate that materials used in the manufacture of WD products comply with all applicable environmental laws.
Mektec’s response is included under Fujitsu above.

Paragon’s response:

Wages and overtime payment
At Paragon overtime is not compulsory as is the case of Mektec. However, as wage are very low workers generally want to work more than the regular workday of 8 hours. The overtime is usually 3.5 hours. The company knows this and therefore has made overtime conditional on reaching the daily production target. In other words, workers are denied overtime if they do not reach the set production target, which is hard to meet.

Paragon ans : Paragon Electronics working condition is 3-shift system with 7-hour work. Overtime work is volunteered by employees. The 36-hour of overtime work for a week is not allowed regarding to the law.

Regular working hours: 7 hours, 6 days per week, Morning shift: 6:00-14:15, Afternoon shift: 14:00-22:15, Night Shift: 22:00-6:15
Volunteered overtime on workday: 3.5 hours per day  Volunteered overtime on holiday: 7 hours per day
Comment: 10.5 hours in total each day. Note: Overtime work is occasionally occurred to be performed.

Workers at Paragon also mention a case of unjust wage deductions because that their annual bonus will be cut if they do not meet their production targets. They may loose up to 4/5 of their bonus.

ans : Bonus payment is based on company performance. Bonus is given to workers based on their attendance and performance not individual production target

At Paragon, the management discourages the formation of union by prohibiting people to talk with more than 5 persons together and states workers have to talk to the management when there are problems. The workers strongly feel that the management does not want a union in the factory. Hence, not surprisingly, so far no union has been formed in Paragon.
Paragon ans: Paragon Electronics implements two ways communication with employees. The information is passed from management staff to employees by their supervisory levels. Paragon Electronics encourages its employees to express their opinions and comments in any aspects. Their comments and opinions come to managerial team through various ways: meetings, activities, parties, moreover all levels of employees can easily communicate to management staff especially top management.

At Paragon there are problem with dust. Before workers use protection masks but recently the company abolished them because it wants to save money. In addition, workers who use magnifying glasses extensively, experience trouble with their eyesight.

Paragon ans: Production room is equipped with clean room condition. Workers must walk through the air shower room to eliminate dust before entering the production room. Regarding to the environmental aspects; dust is periodically monitored. The occupational health and safety are under no obligation to conduct in PEC.

None of the interviewed workers had any knowledge about codes of conduct and never seen any.

Paragon ans: Code of conduct is stated to new employees during the orientation period before they start to work at Paragon Electronics. Excessive Working Hours and Intensive Production Rhythms

Finally, at Paragon workers are subject to degrading treatment and intensive production rhythms. Every month the manager is speaking to the workers just to yell and shout at them to make them work harder. Moreover, workers feel that targets are set which are impossible to complete. At Paragon there is also a weekly meeting with the supervisors to make them work harder and the management threatens to close the factory in case they do not increase their efforts.
Paragon ans: Yelling and shouting are not manner within Paragon, we do have many other ways to encourage workers through weekly meeting. There is also weekly meeting with supervisor to enhance workers attitude and guide them to work happily and effectively at Paragon. Paragon set target with careful consideration and we have exceeded our target every year. Paragon continues to expand every year. During management meeting, management always mention about expansion plan not shutting down factory as SOMO comment.

<table>
<thead>
<tr>
<th>Supplier</th>
<th>Action to Date / Comments</th>
<th>HP Audit Summary</th>
</tr>
</thead>
<tbody>
<tr>
<td>Delta</td>
<td>Allegations related to Delta Thailand facility. Delta responded 1/19/07</td>
<td>Delta was audited in 2004 and CAR in place. Re-audited by a third party (ERM) in 2006 and will be re-audited in 2007.</td>
</tr>
<tr>
<td>Delta Supplier: CKL</td>
<td>Confirmed</td>
<td></td>
</tr>
</tbody>
</table>

Allegations in SOMO report related to Delta Thailand:

Thank you for giving us the opportunity to respond to SOMO’s report. We sincerely regret that SOMO found deficiencies during their Corporate Social Responsibility (CSR) evaluation of Delta Thailand, and we are taking vigorous action to address these issues. Overall, we are highly committed to implementing a sound and compliant CSR program, and we believe we are on the right track.

Please be assured that Delta Thailand is continuously making improvements in all aspects of our CSR program. For the past several years, including this year, Delta Thailand has received labour relations awards (please see the attached) from Thailand’s Ministry of Labour, thanks to our employees and their union.

Despite our continuing efforts to address all employees’ needs, there are still some employees who feel we need to do better. For this we are making further improvements and seeking better communications.
In SOMO’s report, Delta Thailand was cited for deficiencies in working conditions. We offer the following for clarification and to describe specific actions we are taking on the points highlighted in SOMO’s report.

3.1.1) Employment is Freely Chosen
Security guards at the factory entrance are simply for crowd control to protect the safety of employees and the property of both employees and company. Employees obtain a permit from a superior to leave the factory premises during working hours only to ensure attendance and to know their whereabouts. That is not correct to imply that Delta use this to control or to force our employees to do overtime.

3.1.2) Discrimination and Unequal Treatment of Contract Workers
We use contract workers to fulfill short term upside business and rush orders. Contract workers are from qualified labour agencies that pay these workers according to labour law. Meanwhile, we do promote contract workers to become our regular workers if they perform satisfactorily.

3.1.4) Freedom of Association and the Right to Collective Bargaining
Delta does have an annual discussion on a collective agreement between the labour union and management. We have just concluded the latest agreement on 2 Nov ’06 and both of union and management are satisfied with the results. This is the way we settle any dispute on wage issues and it has worked well for years.

3.1.5) Wages and Overtime Payment
Delta pays employees according to the labor laws. Most employees receive more than the minimum wage set by the government. An annual wage increase is part of our collective agreement.

For the bonus is reduced in case of sickness. In our yearly bonus calculation, sick leave is also considered and the bonus may be reduced. For a full year of 100% attendance, sick leave is also considered. Both cases are based on an agreement with union in order to be fair for those workers who do not apply sick leave.

And we strongly affirm that there are no wage deductions for sick leave. In fact, we pay wages to workers as long as they apply for sick leave after they return to the work place. Our human resources
department makes this point clear in our orientation program and through publication on our bulletin board for the better understanding of workers.

**Health and Safety Conditions**

We do have an exhaust system to take away fumes from soldering. We also take samples of air for testing by a certification body to ensure it is not harmful and send workers who handle soldering for an annual medical checkup at a hospital. Apparently some workers are still concerned about their health, which we do understand, and we will improve our communications with them to better understand their concerns. Note that we are certified with ISO14001 and OHSAS 18001.

We will make further improvements to the exhaust and circulation system for soldering fumes and reduce smells in the cooler fan factory within the next 2 months. The plan is to increase fresh air intake from 20% to 25%, adjust the number of air handling units in the assembly line and injection area for better air circulation and add 1 exhaust unit of 30k CFM with 8 additional exhaust outlets to reduce the smell in the working area.

3.1.8) **Awareness of Code of Conduct and Audits**

We do have a CSR Policy and general guidelines that are very similar to the CSR programs of our major customers. Most, if not all, of our employees and workers are fully aware of these CSR policies though they may not be aware of the guidelines of specific customers.

For our suppliers, we are setting up a CSR team in January 2007 to audit and help our suppliers on CSR issues and to build on what has already been done.

With reference additional queries about CKL, we like to report the status as following; CKL is one of our PCB Vendor which we bought a very limited quantity at this moment. We do get PCB from them to support service product, which are available in small quantity or going to phased out.

We hope that the above shows Delta Thailand’s commitment to CSR and our dedication to further improvement. I appreciate your interest in helping us resolve this CSR matter and welcome your comments and suggestions on how we can improve. I assure you that Delta is working
hard to fulfill both our CSR policy and the expectations of all of our customers.

1-5-1 Kiba, Koto-Ku, Tokyo,
135-8512, JAPAN

Tel:+81 3 5606 2164
Fax:+81 3 5606 2418

Date: December 18, 2006

Ms. Irene Ong
Senior Material Director
Seagate Thailand

Subject: Confirmation of Labor condition at LITEC (Fujikura Ltd. 100% Subsidiary)

Dear Ms. Irene Ong:

Regarding the above subject, we are pleased to confirm that LITEC Ltd., which is our subsidiary in Thailand, is following Thai regulations such as Thailand Labor Protection Law and not abusing the workers. Please see the attachment (Appendix 1) for confirmation of the labor, health and safety condition. In order to reassure our customers, however, we are planning to conduct both internal and external audit in January 2007. If you have further questions please feel free to contact us.

Sincerely yours,

Masato Kikae
Senior Executive Officer
General manager
Electronic Component Division
Printed Circuit Board Division.
<table>
<thead>
<tr>
<th>No</th>
<th>Item</th>
<th>FJK Reply</th>
<th>Explanation</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.1</td>
<td>In most factories there are guards and workers are only allowed to enter or leave the workplace during specific hours and unless they have a permit or there is an emergency</td>
<td>Yes</td>
<td>Controlling workers entry/leaving timing is to properly maintain production system.</td>
</tr>
<tr>
<td>1.2</td>
<td>In many factories overtime is compulsory, meaning that workers are forced to do overtime.</td>
<td>No</td>
<td>LTEC working hour is 8 hours/day + over time 2.5 hours/day (Max 10.5 hours/day). LTEC adjusts the worker's working schedule to avoid 7 days working in a week. LTEC has not forced the workers over time working and has got the consent of over time working from the worker.</td>
</tr>
<tr>
<td>1.3</td>
<td>At LTEC, workers mention that their regular workweek is 8 hours per day during 6 days a week. Moreover, they indicate they are forced to work overtime for an additional 4 hours per day and on Sundays. This means that working hours at LTEC exceed the ILO standard.</td>
<td>No</td>
<td>LTEC has appropriate salary system based on the decision of rating meeting. LTEC provides at least legal minimum wage for new operators.</td>
</tr>
<tr>
<td>1.4</td>
<td>In three production sites, including LTEC, workers state their wage is not enough to cover the cost of living, let alone save money. They also point out they feel forced to work overtime in order to earn additional income to cover basic expenditures.</td>
<td>No</td>
<td>LTEC may limit the scope of employment in range of law if workers health condition become deteriorated unrelated to the work environment/operation. In employment, LTEC does health check and will not employ the worker if he/she fails health check. LTEC provides yearly health check and reports this result to all workers. Workers are required only to report sick leave to supervisor and do not need any permissions from supervisor. (Also refers to 1.4 for the end of year bonus and promotion)</td>
</tr>
<tr>
<td>1.5</td>
<td>Two cases of discrimination were reported. At LTEC it was reported that workers who have hepatitis B only get a year-to-year contract. Further, workers pointed out that obtaining sick leave and the size of the end-of-year bonus and promotions strongly depend on personal contacts with the supervisor.</td>
<td>No</td>
<td>LTEC does not restrict union, unionization and any right to group and together.</td>
</tr>
<tr>
<td>1.6</td>
<td>The findings with respect workers freedom of association and the right to collective bargaining vary across production sites. At present, there is no union at LTEC. It is unclear why.</td>
<td>No</td>
<td>LTEC employs workers according to Thailand Labor Protection Law, over the age of 18 years old.</td>
</tr>
<tr>
<td>1.7</td>
<td>Although in the past in some factories employed children, these practices have been put to an end and no evidence of child labor was encountered in any of the factories investigated.</td>
<td>No</td>
<td></td>
</tr>
</tbody>
</table>

78
<table>
<thead>
<tr>
<th>No</th>
<th>Item</th>
</tr>
</thead>
<tbody>
<tr>
<td>2</td>
<td>Health and Safety conditions</td>
</tr>
<tr>
<td></td>
<td><strong>2.1 There have been some minor and two major accidents in the factory.</strong></td>
</tr>
<tr>
<td></td>
<td><strong>2.2 Several workers feel sick although they passed the annual health check.</strong></td>
</tr>
<tr>
<td></td>
<td><strong>2.3 There are not enough toilets</strong></td>
</tr>
<tr>
<td></td>
<td><strong>2.4 Protective clothing is not comfortable and is often not used because workers feel it prevents them from meeting production targets.</strong></td>
</tr>
<tr>
<td></td>
<td><strong>2.5 None of the interviewed workers had any knowledge about codes of conduct and never seen any.</strong></td>
</tr>
</tbody>
</table>
Comment received by Acer related to Thai HDD suppliers, February 26, 2007.

Figure 1: Acer HDD Supply Chain in Thailand

Comment Acer: The above information is incorrect in parts. The following table correctly shows the suppliers chosen by the HDD manufacturers:

<table>
<thead>
<tr>
<th>HDD manufacturers</th>
<th>Suppliers</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hitachi</td>
<td>LTEC, MekTec, MekTec, Murata</td>
</tr>
<tr>
<td>Samsung</td>
<td>LTEC, MekTec, Murata</td>
</tr>
<tr>
<td>WD</td>
<td>LTEC, MekTec, Murata</td>
</tr>
<tr>
<td>Seagate</td>
<td>LTEC, MPM (incorrectly named MMI by SOMO), Innovex, MekTec</td>
</tr>
</tbody>
</table>
Please also indicate in your diagram the main competitors of Acer on the “PC manufacturers” level. Otherwise one may get the impression that the shown supply chain is unique to Acer while in reality it is the same for all of Acer’s competitors.
<table>
<thead>
<tr>
<th>Seagate:</th>
<th>Seagate has completed its expansion activities in Korat. No public press release has been made by Seagate recently of future expansion.</th>
<th>✓</th>
</tr>
</thead>
<tbody>
<tr>
<td>Seagate Technology (Thailand) Ltd. Address: 1627 Moo 7 Teparuk Road Tambol Teparuk, Amphur Muang, City: Samutprakarn Post Code: 10270 Country: Thailand Phone Number: +66 (0) 2715-2999 Fax Number: +66 (0) 2715-2289, 2278 General Email: URL: <a href="http://www.seagate.com">www.seagate.com</a></td>
<td>Our Address is: Seagate Technology (Thailand) Ltd. Address: 1627 Moo 7 Teparuk Road Tambol Teparuk, Amphur Muang, City: Samutprakarn Post Code: 10270 Country: Thailand Phone Number: +66 (0) 2715-2999 Fax Number: +66 (0) 2715-2289, 2278 General Email: URL: <a href="http://www.seagate.com">www.seagate.com</a></td>
<td>✓</td>
</tr>
<tr>
<td>Seagate Technology (Thailand) Ltd. (Chokchai) 294 Vibhavadi-Rangsit, Lam Lukka, Pathum Thani; tel 5318161; fax 5313764 ISO 14001, AJA Registrars, 18-Sep-97 Manufacture of hard disc drive and material purchasing, handling and storage at TMC</td>
<td>Site was closed</td>
<td>✓</td>
</tr>
<tr>
<td>Seagate Technology (Thailand) Ltd. (Korat) 90 mu 9 Mittraphap Rd, Sung Noen, Nakhon Ratchasima; tel (044) 286450; fax 286490 ISO 14001, SGS, 28-Aug-97 Manufacture of head gimbals assemblies for hard disk drives</td>
<td>Our Address is: Seagate Technology (Thailand) Ltd. (Korat) 90 mu 9 Mittraphap Rd, Sung Noen, Nakhon Ratchasima; tel (044) 286450; fax 286490 ISO 14001, SGS, 28-Aug-97 Manufacture of head gimbals assemblies for hard disk drives</td>
<td>✓</td>
</tr>
<tr>
<td>Seagate Technology (Thailand) Ltd. (Rangsit) 152/11-13 Thanyaburi, Lam Lukka, Khlong 7, Pathum Thani; tel 5774780; fax 5772687 ISO 14001, AJA Registrars, 20-Sep-97 Manufacture of motor and pole products for computer disk drive</td>
<td>Site was closed</td>
<td>✓</td>
</tr>
<tr>
<td>Location:</td>
<td>CORRECT</td>
<td>INCORRECT</td>
</tr>
<tr>
<td>---------------------------------</td>
<td>---------</td>
<td>-----------</td>
</tr>
<tr>
<td>Asia Business Center Innovex (Thailand) Limited 79 Moo4, EPZ Zone2, NRIE T.Ban Klang, A.Maung Lamphun 51000, Thailand Phone:+66 53554700 Fax:+66 53554699</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Innovex (Thailand) Limited 79 Moo4, EPZ Zone2, NRIE T.Ban Klang, A.Maung Lamphun 51000, Thailand Phone:+66 53554700 Fax:+66 53554699</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>General</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Innovex (Thailand) Ltd. is a subsidiary of Innovex Inc., an American flexible Circuit Manufacturer supplying many customers such as Seagate and Hitachi. In September 1999, Innovex announced that it had successfully completed its merger with ADFlex Solutions, Inc. The combined company is now the largest flexible circuit manufacturer in North America.</td>
<td>✓</td>
<td></td>
</tr>
</tbody>
</table>

Seagate Technology (Thailand) Ltd. (Tepharuk) 1627 mu 7 Tepharuk, Samut Prakan; tel 3835777; fax 3835736 ISO 14001, SGS, 21-Jan-97 Manufacture of head gimbals assemblies for hard disk drives

Seagate Technology (Thailand) Ltd. (Wellgrow) 73 Wellgrow IE., Bangna-Trat km.36, Bang Pakong, Chachoengsao; tel (038) 570514-21; fax 570543 ISO 14001, AJA Registrars, 3-Oct-97 Manufacture of head stack assemblies and components
In the past, Innovex primarily produced lead wire assemblies that connect the back end electronics of a hard disk drive with the heads that read and write information to or from the disk. During the last two years, the company has transitioned from this traditional business to manufacturing flexible circuit interconnects. Over 75% of the Company’s revenue is currently generated from the manufacture of flexible circuits.

There are two branches of Innovex in Thailand: one is in Korat province, with one factory and the other is in Lamphun province with three factories. In August 1996, the Company established a joint venture located in Lamphun, Thailand with Hana Microelectronics. The joint venture was 80% owned by Innovex Inc. and 20% owned by Hana. The Company purchased the remaining 20% equity interest in ATL from Hana in September 1997.

The company informs the workers in graphs of its profits. The graph only shows points and upward or downward slopes, no figures, percentages, or numbers and therefore the employees do not know what it means. The workers are informed about their targets and that they will earn extra money when reaching the target. They are however not informed about what they will earn exactly and the management will give less money when their profit is lower.

Innovex is increasingly producing their own raw materials (using templates). Which is preventing late arrivals, oxidation of copper materials when they are shipped etc.

Currently, Innovex employs about 3,000 persons, fluctuating amount, depending on orders. At the time of the workers interviews the company is hiring new people, while at the same time people are leaving the company because they cannot work enough.
Currently, there are job announcements and new hiring daily. New employees are told they will receive full benefits, but there are some workers leaving daily because of lack of overtime. If workers only receive daily rates and no overtime pay, they do not have enough income and will leave Innovex to look for a job with more income. "To put it simply, we cannot see our future here, there are more workers leaving than new hires, because there is not enough work and no overtime. The workers are leaving to find jobs with higher incomes. All the new workers are coming in to replace the employees leaving like this."

Employees do receive full benefits. Overtime is based upon market conditions and customer demand. Innovex is the only company in the area that pays new employees over minimum wage upon certification.

Innovex employs more women than men: about 80% of employees are female. About 70% of the employees are full-time daily wage earners, who have passed a four month (119 days) probation period. The remaining 30% of employees are monthly wage earners, who are employed as office staff and personnel department workers. The company used to hire workers from an employment agency but is now hiring directly new workers.

The company's environmental policies follow the ISO 14000 standards. Workers are only given a basic level of knowledge concern environmental issues at the ISO trainings. Hazardous waste is separated and disposed of by a waste removal company. Besides this, recycling is done by assigned workers.

Innovex adheres further to ISO 9000, and ISO 18000 (Health) Standards. The workers don't know how these are implemented, and if they really are implemented, because after seeing the standards, most workers think their workplace should not be able to pass these standards.

Workers are only allowed to enter or leave the workplace during specific hours. There is a guard who checks the times workers enter and leave the factory, as well as checking worker’s bags and bodies. Only female guards are allowed to check female workers, and male guards check male workers.

All the known standards have successfully recertified ISO9001, OHSAS18001 recently.
Innovex's Lamphun factories produce electronic components for various brands, including:

- Nokia mobile phone circuit board chips
- IBM hard disk processors
- Philips TV and computer circuit boards
- Hitachi electric circuit boards
- Samsung televisions and digital cameras
- Philips TV and computer circuit boards
- Samsung televisions and digital cameras
- 3M
- Maxtor
- Quantum

The main customer on the moment is Seagate in Pathumthani province. IBM is ordering again after being away for quite some time, small orders from Samsung.

**Code of Conduct**

The workers that were interviewed all said that they have never heard of a buyers code of conduct. The management and other personnel never mentioned anything about a code of conduct and nothing has even been posted on the notice board. They only know about the companies rules, that are indeed posted on the notice board.

Customers come to the factories often, but they only ask about the working processes and never about employee’s health, benefits, or other issues that concern working conditions in the factory. The customers tend to talk to the supervisors not to the workers.

**Discrimination**

Innovex has a written policy and a reminder was sent by email to all employees from the COO reminding them of the policy as recently as November 2006.

Severe forms of discrimination cannot be documented because of language barriers.

<table>
<thead>
<tr>
<th>Product/Brand</th>
<th>Innovex Factories Produce</th>
<th>Code of Conduct</th>
<th>Discrimination</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nokia</td>
<td>Yes</td>
<td></td>
<td></td>
</tr>
<tr>
<td>IBM</td>
<td>Yes</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Philips</td>
<td>Yes</td>
<td></td>
<td>Measured</td>
</tr>
<tr>
<td>Hitachi</td>
<td>Yes</td>
<td></td>
<td>Measured</td>
</tr>
<tr>
<td>Samsung</td>
<td>Yes</td>
<td></td>
<td>Measured</td>
</tr>
<tr>
<td>Seagate</td>
<td>Yes</td>
<td></td>
<td>Measured</td>
</tr>
<tr>
<td>Quantum</td>
<td>Yes</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Maxtor</td>
<td>Yes</td>
<td>Measured</td>
<td></td>
</tr>
<tr>
<td>3M</td>
<td>Yes</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Acquired</td>
<td>IBM disc acquisition</td>
<td></td>
<td></td>
</tr>
<tr>
<td>IBM disc</td>
<td>IBM disc acquisition</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Maxtor</td>
<td>IBM disc acquisition</td>
<td>Measured</td>
<td></td>
</tr>
<tr>
<td>Seagate</td>
<td>IBM disc acquisition</td>
<td>Measured</td>
<td>Measured</td>
</tr>
</tbody>
</table>
In the factories, there is no difference between wages for men and women working in the same position. Most of the male workers work with machinery, while most of the females work on the production lines. Men and women have equal opportunities for promotions. Most workers are women and most of the supervisors are women as well. Women who are pregnant are not dismissed.

### Labor Relations

There are no labor unions in Innovex Company, and most workers in the Lamphun factory had never heard of the term “labor union” before. When the workers have a problem, they do not know how to bring this to the management’s attention. When the workers can’t stand the problems any longer they will leave the company to find work elsewhere.

### Wages

The wages at Innovex factories are higher than in other comparable factories. However, Innovex offers less benefits than other companies.

### Bonuses:

- Incentive bonus pay
- Fuel costs
- Food costs

Also provide annual attendance and year end bonus.
Minimum daily wage is 145 Baht per day. The interviewed workers say that without overtime, they don’t have enough money for costs of living. With the money they earn through overtime, they have just enough to cover living expenses, but they can’t save any money. Most of the workers at Innovex are looking for work at other factories.

Workers would think that the minimum wage for a normal day would have to be at least 200 Baht/day in order to survive. Workers who have been with the company for more than 10 years are making more than 200 Baht/day, and that is just enough to get by on.” When asked, “If your wages aren’t enough, what can you do to survive?” Workers answered, “We have to be frugal, because we aren’t able to do any work at other times in order to supplement our income— we have to work our shifts. We have to try to work as much overtime as possible, as well as working holidays and Sundays to increase our incomes”.

Working hours

Workdays are eight hours long, and the workweek is six days long, with Sundays off. During periods when there are many orders workers will have to work overtime. Workers will want to work the overtime as well in order to increase their pay. About 2 years ago, there was so much work that some workers started work at noon and finished the next day at 7:00 in the morning. Workers starting at 4:00 PM worked until 7:00 the next morning, and those starting at 7:00 finished at 10:00 the following morning. The workers called this “overtime Marathon”. One worker called the Lamphun Labor Protection and Welfare Office and informed them of the forced labor at the factory. The officer then told Innovex to cease the long overtime working hours.

If there is a lot of work, it is very difficult to ask time off of the overtime, workers cannot refuse to work overtime. If a worker has some personal business and cannot work overtime, they can ask the company for permission to leave, and the decision is left up to the worker’s supervisor. If the supervisor does not approve the request, the worker must follow the orders and work overtime.
Workers mention: “now there is very little overtime, no work on holidays, and the company forces us to take rest days. The company’s policy is that if we don’t use any of our personal days, the company has to compensate us for each day. What has often happened, however, is that when new workers come in, they have tried to be compensated for unused personal days, and the company has told them that they used them all already. Some workers have showed up at the factory dressed and ready for work, only to be told that they must use one of their rest days, and the worker has no choice but to follow the orders. One time, a worker only put in one hour at the factory before they sent him home with a note requesting personal leave (because there was no work that day). Sometimes, we start work at 7, and by 7:30 we are sent home because of no work.”

<table>
<thead>
<tr>
<th>Health and Safety</th>
</tr>
</thead>
<tbody>
<tr>
<td>There is a medical kit in the nurse’s room and a nurse on duty 24 hours/day. There is no regular physician; there has only been a psychologist who comes once in a long while to advise stressed out workers.</td>
</tr>
<tr>
<td>![ ✓ ]</td>
</tr>
<tr>
<td>![ ✓ ]</td>
</tr>
<tr>
<td>![ ✓ ]</td>
</tr>
<tr>
<td>![ ✓ ]</td>
</tr>
<tr>
<td>If a worker is ill, they are allowed to rest for up to two hours. If they need longer than this, they must take a sick day. If they use the sick day, they will lose their hard-work pay benefits.</td>
</tr>
<tr>
<td>![ ✓ ]</td>
</tr>
<tr>
<td>Workers are not allowed to take medicines by themselves. Instead, medicines can only be given by the nurses, who must ask for permission from the supervisor before they can distribute any medicines. If a worker needs to rest in the nurse’s room, they must telephone the production line head before they are allowed to leave.</td>
</tr>
<tr>
<td>![ ✓ ]</td>
</tr>
<tr>
<td>Workers are allowed up to 30 sick days with pay according to labor laws. Even if only taking one sick day, a worker must present a medical certificate and telephone the supervisor to inform them of their absence.</td>
</tr>
</tbody>
</table>
| Maternal leave is given for up to three months with 50% pay according to labor laws. | ✓ | Although an energy conservation effort is practiced, turning off lights at the fire exits is not part of the effort nor practice.

At the fire exits, there are three lights, but the company only turns one of them on, in order to conserve electricity. |
| Safety Equipment: There are paper filter masks, sometimes cloth filter masks, and sometimes disposable paper filter masks | ✓ | Low concentrations of Boric acid are used and all industry standard safety standards are adhered to. Innovex provides personal protective equipment for every employee working with chemicals. We conduct regular internal audits and, as noted, were recently audited by BVQI (ISO certification agency) and certified for OHSAS 18001. |
| There is some exposure to chemicals for some of the employees. Chemicals that they are aware of include Boric acid (concentrated). The turnover rate of workers who use this chemical is quite high. | ✓ | Employee health conditions are monitored regularly. Innovex recognizes the potential hazards associated with microscope work and has complied with or exceeded all safety standards. Nurses are on duty 24 hours per day. |
| Health problems include: Fatigued eyes, backaches, sore legs for workers who are forced to stand. For workers using magnifying lenses, some suffer from fatigued eyes and migraine headaches, some have soreness in the eyes leading to headache, some have swollen red eyes that look like they have been stung by wasps and they have to stop working for a week to recover. | ✓ | |
For the last five years, the factory has not tried to solve the worker’s health problems. They have moved workers into rooms in which they must handle chemicals. Chairs are broken, but they have not been replaced or fixed. One worker fell off their chair because the chair slipped, and she suffered back injuries, but the chair has not been replaced or fixed. Work injuries are big deals, and safety officers will come and take photographs when they occur. There are fire extinguishers and fire drills.

As a certified OHSAS 18001 company, there is an incident investigation procedure. Any reported worker health problems are addressed as quickly as possible. There is regular maintenance done on all equipment, including chairs.

The canteen is not clean, and a worker reflected that, “I don’t know how we can be ISO certified- it floods when it is raining, and there are cockroaches.”

Innovex consistently reacts to feedback about the canteen. There is an official canteen committee with the mission of identifying projects to improve the canteen. The management team fully supports their efforts. The canteen committee is made up of production supervisors and office personnel with surveys from the daily production workers used to drive improvements.

There is an unlocked fire exit. The only locked doors are the regular exits and lockers.

All doors are controlled as required by recognized safety practices. Regular exits are not locked and actually many are automatic doors. Fire or emergency exits are locked but have an emergency button immediately next to the door that when pressed sounds as well as automatically unlocks the door. This is to avoid false alarms by someone accidentally using the emergency exit.
There are not enough toilets and the workers must wait in line. Workers do not often get a chance to use the toilets, because they must first get a pass from the leader or supervisor, without the pass they cannot use the toilet. Some workers suffer from bladder diseases because they are forced to hold their urine. Some workers suffer from abdominal pains or swollen legs and don’t know what is causing the pains.

Apart from these concerns, workers are also worried about inhaling toxic fumes, because they don’t know what chemicals they are inhaling and what the effects will be. During yearly health check-ups, they have told that their health is normal.

There are many unannounced transfers of workers. The supervisor will tell the worker they must move without any forewarning or discussion. The decisions to transfer depend on the whims of the management and the workers cannot refuse to move to the new position.

Innovex has 109 toilets which are more than required by Ministry of Labor. The toilets can be used any time during the workers’ break, supervisor approval is only necessary when leaving the production line. The made “toilet passes” that are used if a worker needs to leave the production line. These can be obtained from the supervisor or line leader, one of which is always available. This procedure is necessary in case of emergency to know where all located if they are not at their normal location.

Apart from these concerns, workers are also worried about inhaling toxic fumes, because they don’t know what chemicals they are inhaling and what the effects will be. During yearly health check-ups, they have told that their health is normal.

All areas that have chemicals or possible fumes have the accepted standard safety monitors and controls.

There are many unannounced transfers of workers. The supervisor will tell the worker they must move without any forewarning or discussion. The decisions to transfer depend on the whims of the management and the workers cannot refuse to move to the new position.

### MMI PRECISION (THAILAND) Co. Ltd.

<table>
<thead>
<tr>
<th>SUPPLIER RESPONSE</th>
<th>SOMO REPORT</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>CORRECT</td>
</tr>
<tr>
<td>Location:</td>
<td></td>
</tr>
<tr>
<td>Nava Nakorn Industrial Estate, Project 1 and project 3</td>
<td>✓</td>
</tr>
<tr>
<td>General</td>
<td></td>
</tr>
</tbody>
</table>
MMI Precision (Thailand) Co. Ltd. is a subsidiary of MMI Holdings (Singapore) Limited[1], an Electro-Mechanical Systems Contract Manufacturer with capabilities in precision machining components, turnkey contract assembly, factory automation and systems integration. The company operates in four countries; Singapore (Headquarter), China, Malaysia and Thailand. The facility in Thailand formerly bore the name of TPW Industries (Thailand) Ltd. In September 2002, TPW changed its name to MMI Precision. In Thailand are four branches of MMI Precision. The information in this report refers to 2 production sites situated in Navanakorn Industrial Estate 1 (in project 1 and 3) and is hereafter referred to as MMI project 1 and MMI project 3. Of the employed of MMI project 1, 30% is male and 70% female and of MMI project 3 20% is male and 80% is female.

<table>
<thead>
<tr>
<th>MMI project 1</th>
<th>MMI project 3</th>
</tr>
</thead>
<tbody>
<tr>
<td>MMI project 1 is producing the metal cases for the HDD, with aluminium press, cutting machine and prototyping work. MMI project 3 is occupied with the hole drilling, screwing and finishing of the HDD metal case.</td>
<td>Overall: 211 regulars, 517 contract workers</td>
</tr>
<tr>
<td>One production site is claimed to have 235 regular workers and 600 subcontracted workers. The other site has 360 workers in total (250 subcontracted and 110 regular workers).</td>
<td>Overall workers comp. Male~ 53.5% in both 2</td>
</tr>
</tbody>
</table>

The buyers

The main client is Seagate/Maxtor but the company also supplies NEC, Minibear, Fujitsu, LTEC and Fujikura. The product specifics vary from buyer to buyer.

| MMI took over TPW business until 2004. Zone 1: Motor Brackets for spindle motor [HDD] & also other non-businesses, e.g. automotive, telco, medical businesses. Zone 3: All non-machining. | Overall: | 93 |
In 2004 two other factories of MMI in Navanakorn were spun off (and are now subcontracting companies) and in 2006 two new factories were opened in Nakorn Rathcasima province- one inside the Seagate factory compound and the other 3-4 km from Seagate, both supplying Seagate.

Seagate receives other parts for the HDD of Belton (the reading heads), Mektec and WD (IC). Seagate does the final assembly of the HDD, buyers Seagate’s HDD’s are all well known computer brands.

<table>
<thead>
<tr>
<th>Workers awareness of company codes and audits</th>
</tr>
</thead>
<tbody>
<tr>
<td>Workers are briefed on Company Policy and Work Rules during orientation and via monthly communication meetings. MMIT policy and work rules are based on current Thai Labour Law B.E. 2541. MMIT is TS16949/ISO 9002 certified.</td>
</tr>
</tbody>
</table>

The company has the following CSR policy: The company has announced it is a “White” (drugs free) factory, although the only thing the company has done is hanging up posters from the Labour Protection and Welfare Division. The company has never spoken to the union or to the surrounding local community about CSR.

<p>| |</p>
<table>
<thead>
<tr>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Worked closely with local police to eradicate drug abuse, if any. All staff were briefed on severe disciplinary actions, including termination, if such offences are committed.</td>
</tr>
</tbody>
</table>

Some buyers did inspect the factory previously, but they never interviewed workers. The buyers only inspected the products ordered whether they fit the specifications. Most buyers also don’t bring their own interpreter with them, and they are let around by the company manager. A few buyers, like Fujikura, did bring their own interpreter, but still they didn’t interview workers. Before the buyers arrive the cleaners are told to wash the floor and make the factory as clean as possible and workers are forbidden to walk on the cleaned floor before the buyer has arrived.

<table>
<thead>
<tr>
<th>Freely chosen labour</th>
</tr>
</thead>
<tbody>
<tr>
<td>No restrictions in place for customers to communicate with the staff.</td>
</tr>
<tr>
<td>Section</td>
</tr>
<tr>
<td>---------</td>
</tr>
<tr>
<td>Child labour avoidance</td>
</tr>
<tr>
<td>Non discrimination / Unequal treatment of contract workers</td>
</tr>
<tr>
<td></td>
</tr>
<tr>
<td></td>
</tr>
<tr>
<td></td>
</tr>
<tr>
<td></td>
</tr>
<tr>
<td></td>
</tr>
<tr>
<td></td>
</tr>
</tbody>
</table>
There is equal opportunity for promotion between the genders. It depends on work experience and educational background. There is frequent sexual harassment of the male line leaders against the women workers, by stroking their shoulders and inappropriate verbal harassment.

<table>
<thead>
<tr>
<th>Labour relations</th>
</tr>
</thead>
<tbody>
<tr>
<td>The company has a labour union: The Computer Parts and Electronics Labour Union. The union is affiliated with the Rangsit and Nearby Area Union Group, the Alliance of Democratic Trade Unions. There has been one strike within the last 5 years in 2003. The union has had several serious disputes with the company.</td>
</tr>
</tbody>
</table>

Staff were laid off based on business exigencies and severance compensation as per labor law were provided. Not all union members were laid off. The past union chair is still employed by MMI and he continues as the union lead in MMI.

Presently, workers cannot openly show their membership or participate in union activities. Especially the contract workers will face harassment and will be pressured to resign. The union leaders have to follow the company regulations very carefully; otherwise they will face scrutiny and harassment in order to get them to leave the job.

Ample opportunities are for union activities and participate in such activities. Quarterly meetings are held among employee committees [mainly union members and management representatives].
The company will present counter demands every time the union present with demands for improving the employment conditions in the existing Collective Bargaining Agreements (CBA) between union and management. The employers is very reluctant to follow the CBA, the union often have to repeatedly remind of the implementation. The union cannot post anything freely on their notice board within the factory, but will have to ask permission from the management first. The employer has threatened to move production to China if the union keeps presenting demands to renegotiate the CBA. The employer has never invited the union in consultations regarding production, transfers, workforce reductions or layoffs. Everything is decided by the employer unilaterally.

All parties adhered to the CBA management does maintain prerogatives on some critical business decisions. As above, ample opportunities and space are allocated for union activities and staff are free to participate in such activities.

The use of outsourced workers has reduced the unions bargaining power.

Also, MMI already successfully dismantled the existing trade union at two of his factories by spinning off these factories and making them subcontracted factories subsequently with new workers via labour agencies. It is to be expected the same will happen at MMI project 1 on short term. This facility is on the nomination list for reallocation to Korat. It is a unionised factory; however the union is not so strong anymore since 14 people of the union were fired. This company will probably be closed, laying off all workers and reallocate. The union at MMI does experience a lot of sabotage by the management.

We are not aware of the reduction in union's bargaining power. Contract workers cater for business fluctuations as per industry trends.

The interviewees gave some reasons for companies to move to Korat:

1. In Korat the minimum wages are much lower.
2. In Korat there are no unions. Unionising in Korat is really tough; it is said the police plays the role of hitman. One organizer, not even a radical one, tried to organize workers and he was shot, happily not killed. This happened 1 to 2 years ago. There was also a researcher active there, but because of threats she went back to Bangkok. Workers in Korat are not familiar with

We are not aware of such events.
union.

3. Companies can get new corporate tax holidays, in Korat this can be 10 years.

<table>
<thead>
<tr>
<th>Wages</th>
</tr>
</thead>
<tbody>
<tr>
<td>The wages of the workers at MMI are different between the regular workers and the outsourced workers: The regular workers earn at least 8,000 Baht per month and the highest amount we learned of was 15,240 Baht. These wages are generally higher than most other electronics companies in the estate. Also the benefits are better, for instance there is an annual bonus equal to one months wages, there is a monthly diligence bonus of 450-500 Baht per month, night shift allowance of 30 Baht per night, free transportation, free rice, there is also an annual new years party and a sports day.</td>
</tr>
<tr>
<td>The regular workers had been with the company and previous company (TPW) for more than 10 years and hence, the higher salary as compared to the new recruits.</td>
</tr>
</tbody>
</table>

| The outsourced workers earn only 184 Baht per day (or 4,784 per month (184x26)), they get no annual bonus, and their diligence bonus is 150-200 Baht per month. They have free transportation and free rice. |
| The low wages makes it impossible to make ends meet without working overtime. The workers will receive overtime payment in accordance with the law. Most of the workers have 4-5 dependents, for instance their parents, grand parents and offspring and will have to remit money back home for their living. Most workers must send at least 1500 – 3000 Baht per month. Workers often pay 1900-2000 for rent and another 500 for electricity and water. The workers often also pay back on loans and credit card debts. The interests on informal loans are 10-20 % per month. |
| Working hours: forced overtime |

<table>
<thead>
<tr>
<th>Working hours</th>
<th>Forced overtime</th>
</tr>
</thead>
<tbody>
<tr>
<td>In accordance with Thai labor law</td>
<td>✓</td>
</tr>
<tr>
<td>✓</td>
<td></td>
</tr>
</tbody>
</table>

Wages

The wages of the workers at MMI are different between the regular workers and the outsourced workers: The regular workers earn at least 8,000 Baht per month and the highest amount we learned of was 15,240 Baht. These wages are generally higher than most other electronics companies in the estate. Also the benefits are better, for instance there is an annual bonus equal to one months wages, there is a monthly diligence bonus of 450-500 Baht per month, night shift allowance of 30 Baht per night, free transportation, free rice, there is also an annual new years party and a sports day.

The regular workers had been with the company and previous company (TPW) for more than 10 years and hence, the higher salary as compared to the new recruits.

The outsourced workers earn only 184 Baht per day (or 4,784 per month (184x26)), they get no annual bonus, and their diligence bonus is 150-200 Baht per month. They have free transportation and free rice.

The low wages makes it impossible to make ends meet without working overtime. The workers will receive overtime payment in accordance with the law. Most of the workers have 4-5 dependents, for instance their parents, grand parents and offspring and will have to remit money back home for their living. Most workers must send at least 1500 – 3000 Baht per month. Workers often pay 1900-2000 for rent and another 500 for electricity and water. The workers often also pay back on loans and credit card debts. The interests on informal loans are 10-20 % per month.

Working hours: forced overtime
The workers must work 12 hours per day, for the outsourced workers it is written into their hiring contracts that they must work 12 hours per day. The employer requires the workers to work 36 hours of overtime per week. Often the workers have no opportunity to take any day off in a month. The only time off is then when the shift is changed (once per month), where workers will have almost a whole day before they will have to go to work again. The workers will have to work 324 hours per month. The employer will inform on Saturday whether the workers will have to work the following Sunday. As for Monday through Saturday the workers must work 12 hours per day.

Overtime is performed only with the consent of our staff. We do not force our staff to work overtime if they do not agree to do so for whatever reasons that they may have.

This overtime is compulsory: if you don’t want to do the overtime you have to inform the management to get permission for absence. Without permission one gets a warning. A contract worker gets fired after 1 warning and a second absence without permission. Regular workers can get a second warning after which they have to stay home for three days, with the third absence for overtime they are dismissed also.

Overtime is performed only with the consent of our staff. We do not force our staff to work overtime if they do not agree to do so for whatever reasons that they may have.

The workers are not allowed to exit and enter the factory compound freely, but must have a passage note signed by their line leader. The passage note must also state a proper reason for exiting the factory. The company use guards to safeguard the company products. Workers will be searched for if they should smuggle pieces out. The workers are allowed to take 30 days sick leave. Regular workers can take 1 day’s paid sick leave without doctor’s notice. The workers can take 90 days maternity leave. For the outsourced workers, they must provide doctor’s notice for even 1 day’s paid sick leave. The outsourced workers can also take 90 days maternity leave.

In MMIT, security checks for all staff in and out of MMIT's factory are necessary, just like most companies' practices anywhere in the staff need to come into company's premises for official matters, even after their normal working hours, they are allowed to do so as long as they register with the security guard.

Overtime is performed only with the consent of our staff. We do not force our staff to work overtime if they do not agree to do so for whatever reasons that they may have.

Health and safety
**MMI location 1:** This factory produces metal cases for the HDDs. The work in factory in Project 1 is very heavy. There is an aluminium press, a cutting machine and prototyping work is done using a block press.

The workers are very concerned about their health and safety. When it rains the water leaks, which sometimes results in electrical sparks because the electrical plugs are all covered in aluminum dust, which serve as the leader of electrical current to the outside. The aluminium dust when wet turns into acidic waste with a foul smell. The factory building is old and dilapidated. Workers are afraid it will collapse someday. There isn't enough light, and there is a lot of aluminium dust, lead dust and dust from the sand paper used for polishing the pieces. The workers are not protected sufficiently against the dust. They receive a mouth cap but this does not protect them sufficiently.

One woman, working four years 12 hours per day got problems with her health because of the aluminium dust. She went to the doctor and the doctor discovered a lot of alumina dust inside her lungs. After that she was transferred to another department on her own request. And after that her health improved again. She looks healthier now, but she still can't speak normally. There are no improvements made by the management after her sickness.

Some workers have to go regularly to the doctor to scrape out lead dust from the throat. When the workers cannot take it any longer they will ask their line leader to shift work place. Even when workers are being transferred of obvious health issues the employers will just assign another worker to take over the work station, so the problems with contact with lead dust remain unchanged. There are no attempts of improving the production methods to make them safer.

**Zone 1:** Motor Brackets for spindle motor (HDD) & also other non-automotive, telco, medical businesses. All non-HDD business [machining].

The working environment is regularly inspected by the Thai authorities with no major discrepancies. We send our staff for regular yearly check ups and so far, there are no reports of health problems linked to MMIT.

MMIT has no records nor official medical reports of the mentioned incident and of the worker concerned.

MMIT do not engage in any activities concerning the use of lead or its derivatives.

MMIT has no records of reports of the mentioned health worker concerned.
The factory is very hot due to the casting oven with hot aluminium and lead. The workers have heat rashes, sore and dry throats before they have completed their first year of employment. One of the workers told the following: "The melting of the aluminium is a problem, the melted aluminium comes into a base en then a machine is pressing the aluminium, due to the pressing the aluminium is splashing around even to the ceiling. When one get this splashed aluminium on the skin it leaving awful burnings".

<table>
<thead>
<tr>
<th>MMIT does not engage in any activities using lead or its derivatives.</th>
<th>Appropriate. There are no medical reports of heat-related injuries.</th>
</tr>
</thead>
</table>

Also the eyes sight is a problem, because the heat safety glass become steamy and therefore some workers refuse to wear the safety glasses. The dust and smoke is bad for their eyes.

<table>
<thead>
<tr>
<th>It is mandatory for all the vicinities to wear appropriate PPE. Disciplinary actions are taken for workers not wearing the safety glasses.</th>
</tr>
</thead>
</table>

Workers are in contact with following substances: Lead, thinner, sodium Hydroxide (Fire Soda). Loud noise impact workers hearing.

| MMIT does not engage in any activities using lead or its derivatives. | Appropriate. There are no medical reports of hearing loss. |
| --- |

PPE for regular workers: Masks, earplugs, glasses, safety shoes, all distributed for free.

<table>
<thead>
<tr>
<th>Yes</th>
</tr>
</thead>
</table>

PPE for outsourced workers: Masks, earplugs, glasses are free, but safety shoes cost 350 Baht per pair.

<table>
<thead>
<tr>
<th>Yes</th>
</tr>
</thead>
</table>

Some work requires moving half a ton of iron to be cut and fitted to make the block press. This work entails lifting heavy equipment and controlling machines that are very hot, but workers are provided only simple cloth gloves even when they have to take out still hot pieces.

<table>
<thead>
<tr>
<th>MMIT do not use materials of the amount of tonnage stated. Most materials are easily handled manually with the appropriate PPE provided. Cranes are used for heavy duty works, e.g. moulds.</th>
</tr>
</thead>
</table>

During the last fire exercise 3 months ago some of the fire extinguishers didn't function properly and they didn't contain any powder. There is one fire exit but it is locked, because the employer is afraid of theft. Even if the door wasn't locked workers wouldn't be able to use it as the emergency exit leads out to the back wall. The cantina is 80% clean. There are not enough toilets.

<table>
<thead>
<tr>
<th>During the recent fire compliance was the time taken for evacuation that was greater than the stipulated requirements. A follow up exercise was conducted the stipulated requirements with no discrepancies. There was no complaint received from the workers nor the union regarding insufficient toilets and unhygienic canteen conditions. A Canteen Committee, which is comprised mainly of union committee members, oversees the proper operation of the canteen and the selection of the caterer.</th>
</tr>
</thead>
</table>
The union made complaints to the provincial Labor Protection and welfare Department. The inspection came and they checked the light, noise, smoke and dust. Only the light did not pass the inspection, but the smoke, noise and dust did pass the inspection. The union wonders why it passes the inspection. There is a H&S committee in the factory but isn’t effective.

<table>
<thead>
<tr>
<th>MMI project 3</th>
<th>Additional lightings were installed for all workstations. MMIT is in full compliance with Thailand’s labour law.</th>
</tr>
</thead>
</table>

The working environment in the second factory is slightly better than the first, as there is no casting oven. This makes the factory less hot. The workers are still very concerned about their health as they are afraid of accumulating chemicals in their body. The light is adequate and there is less dust compared to the first factory. Workers are in contact with following substances: sodium Hydroxide (Fire Soda), acid salt (which is corrosive) thinner and DI solution.

- PPE are provided as appropriate. There are also no records or medical reports associated with the usage of the said solvents or chemicals.
- PPE for regular workers: Masks, earplugs, glasses, safety shoes, all distributed for free
- PPE for outsourced workers: Masks, earplugs, glasses are free, but safety shoes costs 350 Baht per pair.

When the local district officer from Tha Klong held a fire exercise the company failed. Only when the management invited fire fighters from Ayuttaha to do the training did they pass. There are enough fire exits as according to the law.

- During the recent fire exercise the company failed. Only when the management invited fire fighters from Ayuttaha to do the training did they pass. There are enough fire exits as according to the law.
- The cantina is 60% clean. There are enough toilets.
The drinking water is not clean at both factories, but workers have no other choice but to drink it. Sometimes when the water is not cold it has a salty taste. Workers often face health problems. One interviewed outsourced worker went to Nawanakorn Hospital the doctor diagnosed her illness as OHS related. She was told that she had to get her throat cleared of lead dust immediately otherwise she would risk cancer. Still the doctor didn’t write in the doctor’s notice that her illness was occupational. The notice only stated that she had an infection. Accidents include electrical shocks, cuts on knives and sandpaper. One worker broke his legs when a fork lift hit him. The company has no policy on solving the occupational hazards of the workers.

MMIT does not engage in the use of lead or its derivatives. PPE are provided as appropriate. There are also no records or medical reports of these mentioned OHS related, cancerous cases or the fork lift accident. The Union Chair is a member of the Safety Committee, which is a union committee member.

Security of employment / Excessive use of Contract Labour

There is a lot of contract labour at MMI; only 20% of the workforce of MMI 1 and MMI 3 are regular workers, the rest have their employment outsourced through labour agencies. The outsourced workers don't have any job security. Their length of employment contract is completely dependent on the amount of orders the company receives.

Interviewed workers think there is no way to become a regular worker, some workers already work for 5 years and are still subcontracted workers. They are paid per day; skilled workers like technicians are paid per month. The regular workers are the first workers, all new workers can’t apply to become a regular worker.

Humane treatment

MMIT does provide opportunities to contract workers to convert to regular staff.
The workers have to work fast and they are constantly told by the line leader that they have to work faster. This means that workers will have to take out the finished pieces before they have had enough time to cool off. If they wait until the pieces have cooled off they will not be able to reach the targets set by the line leaders. Only by being a diligent worker can the outsourced labour have any hope of being employed regularly. This also makes some take amphetamine in order to work faster.

Workers' performance based on targets was developed by Industrial Engineers and is within stipulated standards. PPE is provided as appropriate, e.g. thick gloves for handling hot work. MMIT does provide contract workers to convert to regular staff. There were no cases of amphetamine consumption that MMIT is aware of and MMIT's clinic do not possess or prescribe such drugs.

Environmental impact.
The company has no environmental policy. The workers don't know about the environmental aspects. The company sells hazardous waste to Winder. These include Aluminium and copper. The company has no recycling policy and has never consulted with the union about the environment.

We are environmentally conscious and all factory waste is disposed in accordance with local environmental regulations via approved licensed vendors.

LTEC LTD.

SUPPLIER RESPONSE

<table>
<thead>
<tr>
<th>SOMO REPORT</th>
<th>CORRECT</th>
<th>INCORRECT</th>
</tr>
</thead>
<tbody>
<tr>
<td>Location</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Northerm Region Industrial Estate (NRIE) 68/1 Moo4, Tambol Banklang, Amphur Muang, Lamphun 51000, THAILAND Tel:(053) 581-002-8 Fax: (053) 581-010-11</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>And Head Office United Center Bldg.28th Floor, Room # 2801 323 Silom Road., Bangkok Bangkok 10500 THAILAND Tel:(66)(2)2311974-79 Fax:(66)(2)2311972-73</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>General</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

LTEC Ltd. Head Office: Northern Region Indur (NRIE) 68/1 M004, Ta Amphur Muang, Lamp THAILAND Tel: (053) 581-0101-11

Bangkok Office: United Center Bldg.28th Flr, Rm #2801, 323 Silom Road., Bangkok Bangkok 10500 THAILAND Tel:(66)(2)2311974-79 Fax:(66)(2)2311972-73
Lanna Thai Electronic Components, known as LTEC Ltd. was established in 1989 by Fujikura Group. It is 100% owned by the Fujikura Group. The company's production is categorised into four divisions, comprising Magnetic coil assemblies, Membrane switches, Fibre optic components, Drive and Media.

It produces components for Nokia mobile phones, microwaves, digital cameras, airbag switches, National electric thermoses, Sony cameras, Acer computer notebooks, Fujitsu microchips, IBM SIMs, Toshiba calculators, and control screens for Sharp microwaves.

Five years ago, LTEC upgraded its factories and installed automatic machines, now the factories have regular, semi-automatic, and fully automatic packaging machines. The machines are modern and safe. Three factories (numbers 3, 4, and 5) have been added. Some products are sent to Thai locations, including Nawanakorn, most products are sent to other countries.

LTEC employs more than 6,000 persons and plans to expand to 10,000 employees. There are about 40% male and 60% female employees.

Most workers are employed full-time (after passing a probationary period) as either monthly salaried workers or daily salaried workers. Part-time staff must sign four month contracts. After four months and a health check, workers can apply for a four month probationary period. If they pass this probationary period, they will then be promoted to full-time employees. If they do not pass any of the steps, they are eligible to reapply for the beginning position and attempt to work their way up to full-time again.

There are some temporary employees (if workers are Hepatitis-B positive, their contract is year to year). The part time and temporary employees make up about 25% of the workers, and they receive full benefits.

Lanna Thai Electronic Components is not register name, our register name is LTEC ltd. The company's production is categorized into three comprising Magnetic coil assemblies, Membrane switches, Fibre optic components.

We cannot disclose the information as it relates to customer's info.

Number of the existing employees are 6400, female employees account for 82% of all employees. Fluctuation of number of employees also relate to confidential information in terms of LTEC’s operation.

It is legal not to offer a job to workers who do not meet the evaluation criteria. Evaluation includes test to check the capability of the provisional workers. LTEC does not accept any employees who has resigned from the company to reapply except when there is a shortage of manpower and the person is competent.

LTEC does not discriminate against employees on the grounds of infection with Hepatitis B virus. The benefit is different between temporary workers and permanent workers.
Five years ago, after working for LTEC 4 or 5 years, hourly wage earners would be promoted to monthly wage earners, but didn’t receive much increase in rank or benefits. Currently, however, even after five years of hourly wages, an employee will only be promoted to monthly wages if they have increased their rank. Since the minimum wage increase, new workers receive almost the same amount as workers who have been here one or two years - there is only a one or two Baht difference in pay rates between new and experienced workers. After one or two years, workers receive 148 Baht/day, while new workers receive 145 Baht/day.

LTEC provides wage rates at or above the standard level or basic minimum wage rates as approved by the Wages Committee established under the Thai labor law. According to the Thai labor law, the employers are required to pay wages at the rate not lower than the basic minimum rate, which is currently Baht 149/day for Lamphun area (adjusted from Baht 145/day in 2006) where the factory is located. There are sufficient difference up to service years though difference is only up to one or two years of experience.

Currently, there is a high turnover rate, new workers come and go everyday. Last year, there was a huge increase in employees from more than 4,000 to more than 8,000 persons - over 2,000 new employees. Eventually, LTEC wants to employ 10,000 employees.

Most employees work on the production line, some are heavy load lifters - such as plate lifters (lifting screens onto bars and having contact with chemicals, standing while working, using their eyes strenuously, working in hot temperatures). These types of jobs are done by men. There are also graphic designers and component design done by some employees. Most of the work is labor intensive and physically demanding, but it requires attention to detail and small components and monitoring machines.

Fluctuation of number of employees relate to the confidential terms of LTEC’s operation.

LTEC issued safety guidelines in 1998 and since then has occasionally developed the guidelines to match with the increasingly complex production processes.

LTEC abides by ISO 9002 and ISO 14000 Standards.

Further initiatives: Donating blankets, sports equipment, and support for flood victims; campaigns for conserving power, and sorting garbage; paper re-use and garbage sorting, after which a company will come to take the garbage away.

There is waste separation into recycling bins and hazardous materials bins. An outside company comes to pick up the hazardous waste. There are workers assigned to waste collection.

LTEC abides by ISO 9001 (version year 2000) and ISO 14001 standards.
| there is a security guard who checks everyone leaving outside of regular hours. workers leaving must have permission papers stating the reason for leaving. female workers are body checked by female guards, while male workers only have their bags searched. |
| checkbld |
| LTEC conducts baggage check for all workers in order to prevent property loss. when employees leave LTEC, guards check the belongings of all employees including management. both female and male employees will be body searched when suspected. for security guards, LTEC increased 1 to 2 female guards per shift to support in employee body searches. |
| checkbld |
| buyers |
| the company makes components for Nokia mobile phones, microwaves, digital cameras, airbag switches, National electric thermoses, Sony cameras, Acer computer notebooks, Fujitsu microchips, IBM SIMs, Toshiba calculators, and control screens for Sharp microwaves. Production is based upon customer orders which are erratic. |
| checkbld |
| code of conduct |
| employees have never heard of a code of conduct. management and other personnel have never mentioned anything about it or posted on the notice board. the only phrase the workers knew was the company’s motto, “Technological superiority for our customer’s satisfaction.” |
| checkbld |
| we cannot disclose the information as it relates to customers’ confidential information. |
| checkbld |
| buyers |
| the company makes components for Nokia mobile phones, microwaves, digital cameras, airbag switches, National electric thermoses, Sony cameras, Acer computer notebooks, Fujitsu microchips, IBM SIMs, Toshiba calculators, and control screens for Sharp microwaves. Production is based upon customer orders which are erratic. |
| checkbld |
| we cannot disclose the information as it relates to customers’ confidential information. |
| checkbld |
| buyers |
| the company makes components for Nokia mobile phones, microwaves, digital cameras, airbag switches, National electric thermoses, Sony cameras, Acer computer notebooks, Fujitsu microchips, IBM SIMs, Toshiba calculators, and control screens for Sharp microwaves. Production is based upon customer orders which are erratic. |
| checkbld |
| we cannot disclose the information as it relates to customers’ confidential information. |
| checkbld |
| workers informed that, “it is difficult to estimate the scale of production for our factories. Last Songkran Festival, one manager said that there was a profit of more than 700 million and profits were increasing. Nokia and Sharp products have been produced continuously since I have worked here. Fujitsu switches now and then, Honda makes a lot of money for the company, Honda and Toyota products everyday, IBM and Seagate hard disks, Sony and Cannon digital camera components- actually more Sony than Cannon because they were here first...” |
| checkbld |
| it is not an official announcement by management. we cannot confirm it. |
| checkbld |
| code of conduct |
| employees have never heard of a code of conduct. management and other personnel have never mentioned anything about it or posted on the notice board. the only phrase the workers knew was the company’s motto, “Technological superiority for our customer’s satisfaction.” |
| checkbld |
| LTEC distributed code of conduct booklet to all employees. employees had a meeting to learn about code of conduct. |
| checkbld |
| buyers |
| the company makes components for Nokia mobile phones, microwaves, digital cameras, airbag switches, National electric thermoses, Sony cameras, Acer computer notebooks, Fujitsu microchips, IBM SIMs, Toshiba calculators, and control screens for Sharp microwaves. Production is based upon customer orders which are erratic. |
| checkbld |
| we cannot disclose the information as it relates to customers’ confidential information. |
| checkbld |
Factory inspections happen frequently, many times per month (inspectors represented many different customers). When customers come to inspect, they mainly are trouble-shooting. For example, when problems occur during shipping customers will come to try to solve the problem, but they will not talk with workers, only with management and supervisors. On occasion, they will ask the Safety Department about safety conditions in the factory, but they never ask about working conditions, hiring procedures, or problems for the workers. Supervisors instruct workers to avoid looking at customers (or visitors) faces.

LTEC has factory inspections several times per year from many customers for troubleshooting, periodic quality and environmental audits. Corresponding to customers are the responsibilities of LTEC management. LTEC carried out safety and working environment diligence in January 2007.

Discrimination

There is no discrimination in the workplace. Men and women are treated equally. Pay rate is equal for men and women and is determined solely on rank and experience. However, there is a problem in assigning promotions and rankings. These come at the end of each year and are given by supervisors who reward some employees and not others based on their personal preferences, and not based on merit.

LTEC provides the wages based on occupation and job grade. LTEC sets fair wage based on the decision of the rating meeting every year. Supervisors cannot decide rankings or promotions of their subordinate by only their preferences. Supervisors must evaluate the following items:
1. Job quality
2. Job quantity
3. Skill in job
4. Responsibility
5. Cooperation
6. Instruction following
7. Company's discipline遵守
8. Working with safety
9. Leave to be calculated
Second, supervisors must meet with division/department manager, all concerned managers, and personnel department manager, to explain their evaluation results. Final evaluation must be approved by division/department manager.

Labor relations
Workers state there is no labour union in their factories.

LTEC has two safety officers who graduated from university programs specific in safety and hygiene. They received the training from Thai government to keep working conditions safe. There is a Security Committee and Safety Officers, who are elected. However, most of the representatives and officers belong to the management and not the workers.

LTEC increased transportation allowance in 2005 and 2006. LTEC has a standard regarding transportation allowance. When the price of gasoline increases by 20%, LTEC considers adjusting the transportation allowance to fit reasonable gasoline expense.

This last year fuel prices have soared in Thailand. A petition was signed by the workers in order to increase their fuel subsidy, and the company agreed to its terms and increased the amount.

LTEC has posted the regulation regarding the consent of overtime working, the request and approval of leaves. LTEC informed all employees of the regulation, and that they would be treated fairly and equally. Supervisors of each production line inform employees in advance on the availability of overtime and holiday work. The employees who wish to work on holidays inform LTEC before the end of each normal working day and the supervisors of production lines consider and announce the arrangement of the holidays to the end of those normal working days.

During the Songkran holiday in 2005 some employees were told they must work over the holidays and would not be allowed to return to their homes. This amounted to a heated dispute with in the end the company gave in and allowed these employees to take the holiday as usual and the same as all the other employees.
There has never been an agreement between workers and the company concerning working regulations because it has never been discussed (workers are not aware of their rights). Instead, the company has only announced to the workers what the terms of their employment are, for example, working hours, overtime hours, employment policies, etc. These announcements are posted outside the nurse’s room for the employees to read. The company has never involved the workers in discussion about the regulations they have only told the workers what they must do. Workers are told to only follow orders.

LTEC has contracts with each employee. At the orientation for employment, LTEC explains the company’s regulation including employee’s rights to all employees. LTEC has a policy to receive suggestions, comments, and complaints from employees regarding respect to all aspects of employment, work environments and welfare. The employees generally communicate their demands through the Welfare Committee. Members of the Welfare Committee are elected democratically.

Workers have no say in company policies or decisions. There are no discussions, exchanging of ideas, or meetings with workers to discuss management decisions. Workers simply wait for announcements to be made by the company and then they follow their orders without any input or feedback.

LTEC provides opinion boxes to increase the satisfaction of employees regarding Safety & Hygiene and work environment.

Wages

The pay scale of LTEC is similar to other electronic components factories. Salaries are slightly lower, but benefits and security are better. Pay rates are adjusted each year, so some years they are better than others.

LTEC determines the wage rates applicable to employees depending on whether the work requires special expertise. For work in the production nature of the work does not require special skills, LTEC provides the same rates to all employees. The legal minimum wage rate is periodically reviewed and adjusted by the Wage Committee to suit the economy and standard of living. The basic minimum wage rate is generally considered as appropriate and acceptable by the government, employers, and employees.

Bonuses:

- Incentive pay begins at 200 Baht and can be as large as 300, 400, or 500 Baht.
- Yearly bonuses are given

Also, LTEC provides orientation for employment, LTEC explains the company’s regulation including employee’s rights to all employees. LTEC provides a policy to receive suggestions, comments, and complaints from employees. LTEC has a policy to receive suggestions, comments, and complaints from employees regarding respect to all aspects of employment, work environments and welfare. The employees generally communicate their demands through the Welfare Committee. Members of the Welfare Committee are elected democratically.

LTEC has contracts with each employee. At the orientation for employment, LTEC explains the company’s regulation including employee’s rights to all employees. LTEC provides opinion boxes to increase the satisfaction of employees regarding Safety & Hygiene and work environment.

Wages

The pay scale of LTEC is similar to other electronic components factories. Salaries are slightly lower, but benefits and security are better. Pay rates are adjusted each year, so some years they are better than others.

LTEC determines the wage rates applicable to employees depending on whether the work requires special expertise. For work in the production nature of the work does not require special skills, LTEC provides the same rates to all employees. The legal minimum wage rate is periodically reviewed and adjusted by the Wage Committee to suit the economy and standard of living. The basic minimum wage rate is generally considered as appropriate and acceptable by the government, employers, and employees.

Bonuses:

- Incentive pay begins at 200 Baht and can be as large as 300, 400, or 500 Baht.
- Yearly bonuses are given

Also, LTEC provides opinion boxes to increase the satisfaction of employees regarding Safety & Hygiene and work environment.
<table>
<thead>
<tr>
<th>Benefit</th>
<th>Provided by LTEC</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Target pay</td>
<td>✗</td>
<td>LTEC does not provide.</td>
</tr>
<tr>
<td>Off-hours shift pay for hourly wages (20%</td>
<td>✗</td>
<td>LTEC pays 'Over time premium' 50% and 'Night shift premium' about 20% of</td>
</tr>
<tr>
<td>higher)</td>
<td></td>
<td>the hourly rate.</td>
</tr>
<tr>
<td>Eyeglasses reimbursement</td>
<td>✗</td>
<td></td>
</tr>
<tr>
<td>Dental Care up to 1,200 Baht/ year</td>
<td>✗</td>
<td></td>
</tr>
<tr>
<td>Fuel costs up to 650 Baht/month</td>
<td>✗</td>
<td></td>
</tr>
<tr>
<td>Food costs- 15 Baht/day, if not working, 10</td>
<td>✗</td>
<td>LTEC provides a meal allowance 1 baht/day (breakfast and lunch), extra 5</td>
</tr>
<tr>
<td>Baht/day</td>
<td></td>
<td>baht (dinner).</td>
</tr>
<tr>
<td>On the average, the average total monthly</td>
<td>✗</td>
<td>The average salary is including overtime work and special allowance.</td>
</tr>
<tr>
<td>salary, including special pay and overtime,</td>
<td></td>
<td></td>
</tr>
<tr>
<td>is 7-8,000 Baht.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>When asked how much the monthly salary would</td>
<td>✗</td>
<td>The legal minimum wage is periodically reviewed and adjusted by the Wage</td>
</tr>
<tr>
<td>be without overtime pay, the worker answered,</td>
<td></td>
<td>Committee to suit the economy and standard of living. The basic minimum</td>
</tr>
<tr>
<td>&quot;umm…. That’s impossible to answer, because</td>
<td></td>
<td>wage is generally considered and acceptable by the government, employers,</td>
</tr>
<tr>
<td>if we did not work OT, we would be fired…</td>
<td></td>
<td>and employees. Supervisors of each production line inform employees in</td>
</tr>
<tr>
<td>Wages</td>
<td>✗</td>
<td>advance on the availability of overtime. Employees who wish to work overtime</td>
</tr>
<tr>
<td></td>
<td></td>
<td>inform supervisors of production lines in advance and announce the</td>
</tr>
<tr>
<td></td>
<td></td>
<td>arrangement of the overtime work 2 hours before the end of the normal</td>
</tr>
<tr>
<td></td>
<td></td>
<td>working days.</td>
</tr>
<tr>
<td>Most LTEC workers said their salary does</td>
<td>✗</td>
<td>The legal minimum wage is periodically reviewed and adjusted by the Wage</td>
</tr>
<tr>
<td>not provide enough income to support their</td>
<td></td>
<td>Committee to suit the economy and standard of living. The basic minimum</td>
</tr>
<tr>
<td>living expenses so they must have outside</td>
<td></td>
<td>wage is generally considered and acceptable by the government, employers,</td>
</tr>
<tr>
<td>income sources as for example sell various</td>
<td></td>
<td>and employees. Supervisors of each production line inform employees in</td>
</tr>
<tr>
<td>goods at work as lottery tickets, phone</td>
<td></td>
<td>advance on the availability of overtime. Employees who wish to work</td>
</tr>
<tr>
<td>cards, and wagering on soccer games or</td>
<td></td>
<td>overtime inform supervisors of production lines in advance and announce the</td>
</tr>
<tr>
<td>boiled eggs,</td>
<td></td>
<td>arrangement of the overtime work 2 hours before the end of the normal</td>
</tr>
<tr>
<td></td>
<td></td>
<td>working days.</td>
</tr>
<tr>
<td>coffee, lucky numbers, anything that people will buy</td>
<td>and acceptable by the government, employers, and employees.</td>
<td></td>
</tr>
<tr>
<td>---</td>
<td>---</td>
<td></td>
</tr>
<tr>
<td>Most workers send money back home to their parents or children—on the average each worker is also supporting one or two others persons back home. These expenses are greatest during harvest times, when extra money is needed to hire workers or rent machinery to harvest the family’s crops.</td>
<td>N/A</td>
<td></td>
</tr>
<tr>
<td>Working hours</td>
<td>LTEC working hour is 8 hours/day + overtime 2.5 hours/day (Max 10.5 hours/day). LTEC adjusts the worker’s working schedule to avoid 7 days working in a row. LTEC has not forced the workers overtime working and had got the consent of overtime working from the workers. LTEC ensures that the number of hours for working overtime and working on holidays should not exceed 36 hours / week.</td>
<td></td>
</tr>
<tr>
<td>Workdays are eight hours long according to regulations, but actually, employees must work 12 hours/day and most work seven days/week (including holidays). Sundays are off when changing shifts, but most often workers are forced to work seven days/week.</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Safety and Health</td>
<td>In the factory, there is a nurse station with a nurse on duty 24 hours/day. Workers are allowed up to two hours rest if they are sick while working. If their condition doesn’t improve after two hours, they can take sick leave after the nurse informs the worker’s boss. If the nurse says the worker must visit a doctor, the worker must go. The worker can go visit a doctor if they are sick at any time. There is a doctor at the health station every Saturday for half a day, which is part of the company health benefits.</td>
<td></td>
</tr>
<tr>
<td>In addition to the nurse’s presence, there is a doctor room on every Tuesday and Saturday for half a day. And also LTEC Ltd. have contract with Hariphunchai Hospital which is located at the Factory around 10 minute by vehicle. Visiting doctor is not an order from LTEC but it depends on employees’ will.</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td><strong>Sick days can be granted by supervisors, but for sick leave of more than three days, a medical certificate is required. However, for single sick days, a worker has to be on the good side of the supervisor. If the supervisor does not like the employee, they can deny them permission. “Once a worker was very sick and asked to be excused, but the supervisor would not allow it. The supervisor would only relent and allow permission after the workers spouse called to the main office to ask permission (the main office ordered the supervisor to grant permission)”. Permission from the supervisor depends on their whim and personal preference, there is no standard or reason for granting vs. not granting sick leave.</strong></td>
<td><strong>LTEC has provided clear requests for leaves. LTEC requires proper evidence of leave when employee is absent continously more than 3 days. For sudden illness that needs to be treated in hospital immediately, the employee or member of his/her family has to inform supervisor about sick leave as soon as possible.</strong></td>
<td></td>
</tr>
<tr>
<td>---</td>
<td>---</td>
<td></td>
</tr>
<tr>
<td><strong>Lighting levels are checked regularly, temperature levels are being adjusted, there is some dust in the work place.</strong></td>
<td><strong>As a complementary explanation, LTEC puts in effort to keep the environment clean and sanitary.</strong></td>
<td></td>
</tr>
<tr>
<td><strong>There is protective equipment available for employees whose work requires them to use it.</strong></td>
<td><strong>LTEC provides basic education to all employees about handling dangerous materials when they joined LTEC. For orientation, LTEC provides basic knowledge on chemical and hazard training to all new employees. LTEC has MSDS (Material Safety Data Sheet) for onsite chemicals. LTEC provides personal protection equipments for the person who works with hazardous chemicals.</strong></td>
<td></td>
</tr>
<tr>
<td><strong>There are hazardous chemicals and the company provides informational trainings about them for those who use them, but for workers who don’t directly use them, they don’t have any information about them.</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>There is clean drinking water.</strong></td>
<td><strong>Two accidents have occurred in 2006 and three employees were injured. All of three employees had medical treatments and returned to work. LTEC investigated the cause of these accidents and took actions to prevent it.</strong></td>
<td></td>
</tr>
<tr>
<td><strong>In the previous year, there was a small increase in work injuries, but most of them were minor injuries, for example, small wounds from the cutters or thinner in the eyes. Some workers needed to be treated at the hospital. Some workers suffered deeper wounds.</strong></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
There were two major injuries in the factory: the first was when the Blank machine fell on a worker’s hand, the second was when a loose nut caused a metal component to fly off into a worker’s leg. Both of these incidents occurred during the same week in July 2006.

Beside these, the main health problems are chronic, including, soreness and fatigue, bone marrow diseases, respiratory system problems, short-sightedness, and many sinus headaches. When given the yearly health check, workers all passed. A worker said, “We feel like we still are suffering, but we all passed the health check... I had no hearing in my ear, but still passed the ear check...”

<table>
<thead>
<tr>
<th>LTEC provides health employees once a year when employees joined company, medical technology company who is licensed to do governmental health check to government and per Thai law. LTEC submits all results of health check to government health office every year. LTEC recommends the employee with health check results indicating potential problems to go to the hospital for further check and LTEC does not fire the employee due to this. LTEC never forces employees to work when in bad physical condition.</th>
</tr>
</thead>
<tbody>
<tr>
<td>LTEC never forces employees to work when in bad physical condition.</td>
</tr>
</tbody>
</table>

When an accident occurs, the Safety officer will take photographs, and the Japanese staff will come down. It is a big deal, because the company is trying to reduce and prevent accidents. When an accident occurs in the factory, the company will investigate to determine whether the accident was the result of negligence or machinery failure.

<table>
<thead>
<tr>
<th>To prevent accidents LTEC investigates the immediately and make actions as necessary. There is negligence or but LTEC investigate an accident and management takes immediate actions.</th>
</tr>
</thead>
<tbody>
<tr>
<td>LTEC has emergency procedures when employee find fire. They must press a fire alarm and then escape from fire area. When a fire alarm occurs, the person in charge broadcasts the location to all employees. LTEC has fire extinguishers and provides training on how to use fire extinguishers and how to escape. LTEC conducted one fire evacuation drill and one chemical leak drill as required by the laws. Location of the fire extinguishers and emergency exits are clearly marked and easy to find.</td>
</tr>
<tr>
<td>LTEC has emergency procedures when employee find fire. They must press a fire alarm and then escape from fire area. When a fire alarm occurs, the person in charge broadcasts the location to all employees. LTEC has fire extinguishers and provides training on how to use fire extinguishers and how to escape. LTEC conducted one fire evacuation drill and one chemical leak drill as required by the laws. Location of the fire extinguishers and emergency exits are clearly marked and easy to find.</td>
</tr>
</tbody>
</table>

There is a yearly fire drill and escape plan, however, if a real fire occurs workers said, “we must escape before”. Once there was a small fire that was doused quickly, and when the fire alarm went off, no one paid attention to it. The workers can hear the alarms, but they aren’t sure exactly which factory the fire is at, where are the fire extinguishers, and if the fire door is locked.

<table>
<thead>
<tr>
<th>LTEC has emergency procedures when employee find fire. They must press a fire alarm and then escape from fire area. When a fire alarm occurs, the person in charge broadcasts the location to all employees. LTEC has fire extinguishers and provides training on how to use fire extinguishers and how to escape. LTEC conducted one fire evacuation drill and one chemical leak drill as required by the laws. Location of the fire extinguishers and emergency exits are clearly marked and easy to find.</th>
</tr>
</thead>
<tbody>
<tr>
<td>LTEC has emergency procedures when employee find fire. They must press a fire alarm and then escape from fire area. When a fire alarm occurs, the person in charge broadcasts the location to all employees. LTEC has fire extinguishers and provides training on how to use fire extinguishers and how to escape. LTEC conducted one fire evacuation drill and one chemical leak drill as required by the laws. Location of the fire extinguishers and emergency exits are clearly marked and easy to find.</td>
</tr>
</tbody>
</table>

114
<table>
<thead>
<tr>
<th>The canteen is clean and has good quality food because workers are allowed to vote, and if a vendor is not good, they will vote them out during the yearly contract renewals. The company will not renew a vendor’s contract if the workers don’t want them.</th>
<th>✓</th>
<th>There is no vote. However, LTEC conducts a survey to get information from employees. If the food service is not acceptable, LTEC asks the vendor to improve their performance. If they do not improve, LTEC replaces the vendor. LTEC and Welf join together in order to select the new vendor.</th>
</tr>
</thead>
<tbody>
<tr>
<td>There are male and female toilets, but there are not enough and they are not clean. The number of toilets has not increased, even though the number of new workers increased by 2,000 last year.</td>
<td>✓</td>
<td>LTEC toilets in accordance with Thai law. Workers from an external contractor clean the toilets 4 times/day, every working day. Employees might have to queue up if all take a break at the same time. Management has taken precautionary step to arrange different times for breaks for each line.</td>
</tr>
<tr>
<td>Workers are still worried about long-term health issues, because of the large amounts of exposure to hazardous chemicals without proper protective equipment. The workers have tried to wear some of the protective clothing, but have found it not comfortable and restrictive, or it does not allow them to work fast enough to meet their targets.</td>
<td>✓</td>
<td>LTEC places priority on the safety of workers. LTEC conducts health &amp; safety education when they join the company. Protective equipment such as eye glasses, gloves, mask, helmet, and boots which is necessarily for their safety are provided and workers are required to wear protective clothing. LTEC displays sign boards to inform employees of hazards in the workplace. The company does not set unrealistic production targets which can not be met with protective clothing.</td>
</tr>
<tr>
<td>Contact details</td>
<td>MEKTEC CORPORATION (THAILAND) LTD</td>
<td>Mektec Corporation (Thailand) Ltd. 25th Floor, Room No 2504 Jasmine International Tower 200 Moo 4, Chaengwatana Road Pakkret A.Pakkret, Nonthaburi 11120, Thailand TEL: 66-2-584-1000 FAX: 66-2-584-6271</td>
</tr>
<tr>
<td>----------------</td>
<td>----------------------------------</td>
<td>-----------------------------</td>
</tr>
<tr>
<td>General information</td>
<td></td>
<td>In total Mektec has 3,100 permanent workers. Mektec has 3,600 employees as of Jan. 2007</td>
</tr>
<tr>
<td>The buyers (customers)</td>
<td></td>
<td>One buyer from Mektec is Hitachi, and Hitachi supplies IBM. Other buyers are Seagate, Fujitsu, Nidec, Western Digital, and TI. Suppliers are not known.</td>
</tr>
<tr>
<td>Worker awareness of company codes of conduct</td>
<td></td>
<td>All workers have never seen a code of conduct from buyer companies. Company's Code of company handbook explained during the orientation period to each and every employee working at Mektec</td>
</tr>
<tr>
<td>The inspections they know are for ISO. No inspections for H&amp;S, or for labour conditions.</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Labour Relations</td>
<td></td>
<td></td>
</tr>
<tr>
<td>There is no trade union in the factory of Mektec. The management not really seems to discourage the trade union very harsh, but it provides alternatives to avoid a trade union. The factory has set up an association for the workers, whit activities as the library, renting CDs en karaoke for the break time. There is also a foundation for charity program.</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Wages, including living wage, overtime payment, excessive wage deductions.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>155 is the minimum wage for in the region where Mektec operates (Ayuthaya).</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>At Mektec the benefits are quite good according to the interviewee: free rice, free meal, better bonuses, sport allowances and birthday party for the workers and better welfare.</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Basic wage is 223 for 7 hours, with overtime this is 165.5 extra.</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Shift allowance is 50 bht., for the night this is 100 bht.</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>A new worker receive 155 per day</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Many people say that they earn good money at Mektec.</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Working hours, including forced overtime</td>
<td></td>
<td></td>
</tr>
<tr>
<td>The interviewed worker works 10.5 hours each day, she must have a very good reason not to do overtime. A normal week is 6 days, during peak season they also work on Sundays, she says she works a lot on Sunday. Peak season is about three months per year, then they work all days.</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Health and safety</td>
<td></td>
<td></td>
</tr>
<tr>
<td>The inspections they know are for ISO. No inspections for H&amp;S, or for labour conditions.</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Labour Relations</td>
<td></td>
<td></td>
</tr>
<tr>
<td>There is no trade union in the factory of Mektec. The management not really seems to discourage the trade union very harsh, but it provides alternatives to avoid a trade union. The factory has set up an association for the workers, whit activities as the library, renting CDs en karaoke for the break time. There is also a foundation for charity program.</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Wages, including living wage, overtime payment, excessive wage deductions.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>155 is the minimum wage for in the region where Mektec operates (Ayuthaya).</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>At Mektec the benefits are quite good according to the interviewee: free rice, free meal, better bonuses, sport allowances and birthday party for the workers and better welfare.</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Basic wage is 223 for 7 hours, with overtime this is 165.5 extra.</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Shift allowance is 50 bht., for the night this is 100 bht.</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>A new worker receive 155 per day</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Many people say that they earn good money at Mektec.</td>
<td>✓</td>
<td></td>
</tr>
</tbody>
</table>
Problem with aluminium dust, but they carry good protection glasses and masks and ear protection, all good protection equipment is provided for free.  

| A flip chip contains aluminium, and lead solder. She knows that the lead is dangerous and it can come in your blood. | ✓ | Employee have been educated about safety issue and protection. There are schedules to monitor this issue and no evidence has been found. |
| Every year there is a extensive medical check; blood tests, urine tests, x-ray from the lungs. The more dangerous the worker has, the more medical checks he/she gets. | ✓ | Physical check follow legal requirement and the result is monitored for prevention. |
| They do find lung problems like TB, but also leukaemia. This worker of Mektec has bloedarmoede. | ✓ | Lung problems, Leukaemia and Bloedarmoede are not caused by working at Mektec. |
| One worker at Mektec have had an accident with a machine, she smashed/broke her hand although she warned the management before that the machine was defect. They didn’t fix the machine and she hurt herself badly. The management paid the medical costs and her sick leave. She returned to work although her hand never healed completely. | ✓ | Mektec set targets with careful consideration and we have exceeded our targets every year. Mektec has many other ways to encourage workers to work harder such Quality Circle Committee activities. |
| Humane treatment of the workers | | On Health and Safety issues, Mektec operates in accordance with laws and policies set to comply (Occupational Health Management System). Mektec focuses on prevention and corrective actions when any cases occur. Currently, Mektec has not had an accident that has cause an employee to be absent from work for more than 600 days. |

Humane treatment of the workers

| The Paragon workers and the Mektec worker were interviewed in the same group. The companies are related, Paragon seems to be part of Mektec but the relation between the companies could not be made clear by the interviewed workers. In the focus group the workers mention abusive supervisors and management at both companies | ✓ | Paragon is Mektec’s Outsourcing Mektec continues to develop and improve supervisory and human management skills and have channels to receive grievances from employees. |
| They don’t like the supervisors (all saying this), they control the workers quite harsh. They have to work harder from the supervisors, they have to meet their targets which are very (too) high. The supervisors make the workers feel bad. The supervisors also change the targets often, different targets during the same day. | ✓ | Mektec to have records and evidence to support this. |
| At Mektec and Paragon, every month the manager has a meeting with the workers just to yell and shout at them to make them work harder. | ✓ | Yelling is not practiced within Mektec. Mektec has many other ways to encourage workers to work harder such Quality Circle Committee activities. |
At Paragon there is also a weekly meeting with the supervisors to make them work harder. The management threatens to close the factory if they do not work harder. If they work harder, the management says, the factory can handle more orders, so the factory can earn more money which is better for them.

Paragon/Mektec set target with careful consideration and we have exceeded our target every year. Paragon/Mektec continues to expand every year. Paragon management meeting looks at expansion plan not shutting down the factory.