Draft Working Paper
Employment and Decent Work in China’s Forestry Industry

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1 Research background and methodology of decent work in China’s forestry industry

The forestry industry is not only playing an important role in protecting ecological environment, biodiversity and ecosystem function, but also shouldering the important mission to supply timber and other forest resources, meet the needs of national economic development, and create employment opportunities in the forest regions. Forestry has provided not only key environmental services and renewable raw materials for other sectors, but also high-quality jobs through sustainable forestry management (ILO/UNEP/IOE/ITUC, 2012). In China, forestry has also undertaken an important task in the national plan to address climate change issues. This has also created new opportunities for China’s forestry development, and decent work generation in afforestation and reforestation, sustainable forest management, forest tourism, forest carbon sinks, and so on.

The purpose of this report is to examine working conditions in the forestry sector in China and propose recommendations for actions to be taken by tripartite constituents in achieving decent work standards for a sustainable forestry industry. It serves as a background paper for the forthcoming workshop on decent work in China’s forestry industry in Beijing, China.

The employment and income generation from the forestry industry mainly depends on the policies adopted by given countries, while the implementation of these policies is based on the institutional environment, as well as its close link with the green economic transformation. Therefore, this report analyzes the main problems of decent work in the forestry industry from the perspective of policy and institutional environment.

Data used in the report is mainly from academic articles, government documents and statistical yearbooks. This report has used data from the China Forestry Statistical Yearbook, although it does not cover a full range of information on employment, health and safety issues in the sector. In addition, most of the research in the field of employment in forestry in China focuses on description, while there is a lack of systematic and in-depth analysis. Furthermore, China’s forestry industry has transformed from the timber harvesting to forest conservation and wood processing after 1998. There are relatively few studies on logging in particular. Therefore, while some specific focus has been cast on the logging industry, this report mainly analyzes the status
of the whole forestry industry. However, this report refers to some of the key findings from some quality publications from the ILO, including the *Study on Green Employment in China* and the *Study on Low Carbon Development and Green Employment in China*, and the report of *Working towards sustainable development: Opportunities for decent work and social inclusion in a green economy*.

Due to the lack of original data source, this report, mainly based on secondary data source (literature research and local experiences and cases), analyses China’s forestry industry, particularly the employment status, development trends and social security policies, in order to answer the following questions:

1) How significantly is the forestry industry contributing to the socio-economic development in China?

2) What is the impact of the forestry industry on the natural environment and employment in China?

3) How decent are the jobs in the forestry industry in China?

4) What is the potential of job creation and skills training in the forestry sector in China?

After the introduction of research background and methodology of decent work in China’s forestry industry, this report introduces the forests, forestry industry and market in China, and the opportunities and challenges faced in the industry. It is then followed by a general discussion on laws and policies which were formulated and implemented to promote sustainable forestry industry development and decent work in the industry. Chapter 4 details the employment situation and decent work in the forestry industry in China. It also emphasizes current challenges faced in the industry on fair employment and decent work promotion. Based on the analysis of current employment status and challenges, Chapter 5 proposes suggestions and actions to be taken to promote decent work in the forestry industry in China. The Conclusion is drawn at the end of the paper with a summary of decent work deficits and suggestions for further analysis and actions.
2 Forestry industry in China

2.1 China’s forests, forestry industry and market

2.1.1 China’s forests

Forest is one of the major resources for the national economy and social development. According to the Seventh National Forest Resource Inventory (2004-2008), the national forest area is 195 million hectares, with the forest coverage rate of 20.36 per cent, a net increase of 11.76 percentage compared to 8.6 per cent in 1949. In terms of forest area, China ranks the fifth in the world after Russia, Brazil, Canada, and the United States. China’s plantation forest has a reserved area of 61.7 million hectares ranking the first in the world, and a stock volume of 1.961 billion cubic meters.
The data comparison of forest inventory since 1973 shows that, China’s forest area and forest stock are growing (Figure 1, and Figure 2). Nationwide, from 1978 to 2010, 24.67 million hectares have been afforested, 11.72 billion trees have been planted voluntarily, and the average annual afforestation area is more than 3 million hectares (Figure 3).
2.1.2 Forestry industry and forestry products

Forestry is an important part of China’s national economy; it has played a vital and special role in maintaining national ecological security, promoting the employment of farmers, increasing farmers’ income and prospering rural economy. Forestry industry\(^1\) in China is a complex industrial group involving the primary, secondary and tertiary industries of the national economy, with a wide range of coverage, complicated industrial chain and multiple product categories.

China’s forestry industry has seen considerable progress in the past decade. The national forestry income in 2005 was just $133.3 billion\(^2\), while it exceeded $158.7 billion in 2006 and $317.5 billion in 2010. The international trade of forest products is increased from more than $40 billion in 2005 to $90 billion in 2010 (SFA, 2011c). The structural adjustment has also taken new steps. The proportion of primary, secondary and tertiary industry of forestry is changed from 52:41:7 in 2005 to 38:53:9 in 2011, indicating a gradual rise of the importance of tertiary industry (SFA, 2011c).

With the increase of domestic demand, output value of domestic forest products has seen steady growth, reaching $118.5 billion in 2010, which doubles that of 2005. In terms of types of forest products, furniture, wood-based panel, and sawn timber have also seen significant growth since 2000; logs and wood pulp production remain stable; while fuel wood production has been declining year by year (Figure 4). It is foreseeable that the development of forest industry and the growth of international market of forest products will lead to the increase of employment opportunity, especially in the field of wood processing and forest services.

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\(^1\) As defined by the UN Food and Agriculture Organization (FAO), the forestry industry includes forestry production, wood processing, as well as afforestation and paper pulp production (FAO, 2011). China’s definition of the forestry industry, however, is slightly different from the definition of the United Nations. According to Classification of Forestry and Related Industries (trial) issued by the State Forestry Administration and the National Bureau of Statistics, China’s definition of forestry and related industries is as follows: forestry is the complex of activities which provide (including also a part of production for own consumption) forest products, wetland products, sand products and services to obtain ecological, economic and social benefits relying on forest resources, wetland resources and sand resources and other related activities. According to this definition, forestry and related industries in China is divided into four parts, including forestry production, forestry tourism and ecological services, forestry management and forestry-related activities (a total of 13 categories, 37 classes and 112 subclasses). This paper mainly focuses on areas such as logging, forestry production, wood processing, and afforestation.

\(^2\) The currency used in this report is US Dollar, using the exchange rate with Renminbi as 1:6.3.
2.1.3 Forestry products market

China’s domestic demand for forest products grows faster than domestic supply of forest products. As shown in Figure 5, except that the wood-based panel supply outgrows demand, sawn timber, furniture, log, and wood pulp production still cannot meet domestic demand, among which the log shortage is up to 35 million cubic meters. This is closely related to the rapid development of processing industry, especially the substantial enhancement of processing capability of wood-based panels in China. Starting from the late 1990s, the gap of the primary forest products is increasing, and this trend seems most likely to continue. At the same time, due to the development of real estate industry, the production of furniture cannot follow up with the growing demand, although the gap has shown signs of narrowing since 2009.
Figure 5 Shortages of various forestry products in China

Source: FAOSTAT, 1990-2010

Due to the shortage of domestic supply, China’s forestry products market highly depends on imports, although the past decades have seen China’s export of some forest products, such as wood-based panel. The import and export of wood products amounted to $42 billion in 2010 and the import of logs are 4.7 times higher than a decade ago. While such a huge demand drives the growth of China’s forest industry, more inclusive labour standards of the forest certification schemes associated with international trade also provide the opportunity to create more decent work in forestry industry (See 3.3).

Figure 6 Import and export amounts of forestry products

Source: FAOSTAT, 1990-2010
2.1.4 Impact of globalization and international trade on China’s forest products and employment

The import and export volume of forest products in China ranks the second after the United States in the world. However, the forestry economic development has the problem of highly dependence on trade and foreign natural resources and products. In 2007, China’s total foreign trade of forest products was $ 64.3 billion, 35 per cent of the total output value of forestry industry, in which the export amounted to $ 31.9 billion, 17 per cent of the total output value of forestry industry. China’s imports of forest products in 2007 was equivalent to about 180 million cubic meters of logs, accounting for 47 per cent of China’s total timber consumption. The high degree of dependence indicates a strong linkage between the domestic and international market for forestry products. At the same time, the high dependence of Chinese forestry economy and industrial development on foreign countries also illustrates the growing impact of the global economic situation on China’s forestry economic development. The current financial crisis has imposed a significant impact on the forestry industry and manufacturing enterprises in China. In recent years, China’s forest products are mainly exported to the United States, Japan, the European Union, the United Kingdom and the Republic of Korea (55per cent), and the employment situation of the forestry industry thus depends on the economic development of these countries to some extent.

2.2 Opportunities and challenges faced by China’s forestry industry

The forestry industry in China entered a new stage after the implementation of the Natural Forest Protection Project in 1998. Forest protection became an essential part of the state’s essential environmental protection strategy. In the 12th Five-Year Plan in 2011 for Forestry Development, not only the increase of forest coverage rate and forest stock volume are taken as key development targets but also the transformation of development path of forestry industry and taking forestry as an effective method for tackling climate change. Under such development background, forestry industry in China is facing a series of opportunities and challenges.
2.2.1 Opportunities

(1) Sustained growth of GDP makes it possible to increase investment in greening the forestry sector and create decent work for forest workers. China’s GDP reached $ 6.3 trillion in 2010,\(^3\) which allows the government to have the capacity to invest in forestry to improve the national ecological environment and achieve sustainable economic and social development. For example, the National Natural Forest Protection Program Phase II is increased with a total investment of $ 38.73 billion, doubling that in Phase I.\(^4\) According to the plan of the Program Phase II, the investment will increase the income of forest dwellers, expand employment scale and opportunities in the forest area and resettle laid-off forest workers due to logging bans (SFA, 2011b; MOHRSS, 2011).

(2) Social development, as a central political target, endows new task to the forestry sector. In the 21\(^{st}\) century, the Central Communist Party of China (CPC) Committee and the State Council introduced the *Decision on Accelerating Forestry Development*, which gives priority to ecological development instead of timber production. The *China’s National Climate Change Program* issued in 2007 took afforestation and the development of forest resources as two of the most important measures to mitigate climate change. Chinese government also acknowledged the strategic role of forestry in economic and social development, and accelerated the institutional and policy reform in the forestry development. According to the *Decision*, Chinese government started to support small size collective enterprises growing in the state-owned forest areas which are aiming to increase job opportunities for the youth and the local residents.

(3) China’s response to climate change has led to the development of forestry and associated employment generation. The forest is the most economical carbon absorber, and it has an unparalleled advantage in reducing emission and in response to climate change. Its associated afforestation and reforestation activities also have immeasurable job creation potential. At the 2007 APEC meeting, Chinese government proposed to establish the Asia-Pacific Network

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for Sustainable Forest Management and Rehabilitation (APFNet) to address climate change issues. China made the commitment to the international community at the climate change summit, that the forest area would be increased by 40 million hectares and forest stock by 1.3 billion cubic meters in 2020 compared with that of 2005, and the protection and utilization of woodlands and the increase of forest resources would be elevated to the national strategy level. The afforestation and reforestation activities initiated by the above commitments can create huge amount of job opportunities. It is estimated that achieving the national target of increasing forest coverage to 23 per cent by 2020 can create 8.84 million job opportunities and can generate 92 thousand jobs for the long-term forest management of the newly planted forests (Zhang et. al. 2011).

(4) The reform of forest tenure and sustainable forest management policy provide strong motivation for sustainable forestry management. In 2008, China started the forest tenure reform for collective forests. At the national level, 173 million hm² forestland was contracted to local households involving more than 500 million villagers. At the village level, 100 thousands cooperative associations were established (FAO, Undated). The reform of collective forest tenure clarified the ownership rights of the forestland with certification. The certified forests were categorized as conservation forest or commercial forest, which allowed forest owners to have the right to manage the forests. It provided strong incentives for the forest owners to manage the forest in a sustainable manner and benefited from the ownership.

(5) Small and medium-sized forest enterprises (SMFEs) have strong potential in creating employment opportunities. Approximately, 87 per cent of the forestry enterprises in China are classified as SMFEs. It was estimated that more than 90 per cent of the total value of wood products in China is generated by SMFEs, and their expansion has become a driving force behind the fast growth of Chinese forestry sector (Luo et al., 2009). Industrial policies to boost the development of the SMFEs and their employment creation capacity will be introduced in the Section 3.2.2.

2.2.2 Challenges

(1) The demand for timber and forest products in China is increasing, while the gap between the supply and demand is expanding. As discussed in the previous session (See 2.1.3),
Along with the fast development of China’s economy, its demand for forest products including the raw wood and pulp has experienced a tremendously growing period in the history (See Figure 5). However, China’s forest supply cannot necessarily meet the demand, which makes China highly dependent on the international market.

(2) The small scale and the low production capacity utilization restrict the development of forestry enterprises. International comparative analyses show that the forestry enterprises in China are relatively small-scale; while most of the large-scale forestry enterprises have high ratio of liabilities to assets, but poor economic performance, which creates a barrier for their further development. For example, the average size of the wood-based panel industrial enterprises in China is only 4-35 per cent of the international size, which makes it difficult to have economic scale advantages (SFA, 2011a). In the context of green economy, the natural forest protection region may be prohibited from logging activities and reduce timber production. The degree of utilization of production capacity may thus be at risk of further reduction, which can restrict the generation of employment opportunities and even result in more laid-off workers in the forestry sector.

5 Productive capacity utilization is a key indicator to reflect the industrial quality. The sufficiency in applying production capacity is highly correlated with the economic efficiency.
3 Laws and policies to promote sustainable forestry industry development and decent work in the forestry industry

3.1 Legal and administration system to promote sustainable development and decent work in the forestry industry

In general, Chinese workers are protected by the Labour Law, the Labour Contract Law and the Production Safety Law in terms of basic labour protection and occupational safety and health. The protection of workers in the forestry sector in particular also refers to the Forest Law and other relevant rules and regulations.

Figure 7 China’s administration system relevant to forestry industry

The administrative organs exercise their functions and responsibility under different laws. In general, the State Forestry Administration (SFA) has to work with the Ministry of Human Resources and Social Security (MOHRSS) and the State Administration of Work Safety (SAWS) on employment matters of forestry workers (see figure 7). In accordance with the Forest Law,
the departments under the SFA are the key administrative bodies in charge of forestry matters in China and they perform their duties related to employment and social security in the forestry sector. At the same time, in accordance with the *Labour Law*, the *Labour Contract Law* and the *Production Safety Law*, departments under the MOHRSS are also involved in the employment and security issues for the forestry sector at large, because they are the coordinating institutions for personnel management of government organs and enterprises, as well as urban and rural employment and social security policies no matter the sector they belong to. Besides, the MOHRSS is also responsible for planning and development policy on human resources and social security, drafting laws and regulations on human resources and social security, developing the departmental rules, organizing the implementation, supervision and inspection, promoting the employment, preparing and implementing policies on wages, employment, unemployment, social insurance, personnel dispute regulation and arbitration system, and coordinating workers to safeguard their rights. In terms of work safety of forestry workers, SAWS is responsible for putting forward suggestions on major production safety principles, policies and important measures; and supervision, inspection, guidance, and coordination of the production work security.

To coordinate the implementation of labour protection in the forestry sector by different departments, jointly issued commands by relevant departments usually take effect during a specific period of time. For example, in 2010, according to the arrangement of the State Council and the SAWS, the SFA issued a *Notice of the State Forestry Administration on Further Carrying out the Activity of Production Safety Year* (LHF [2010]No. 394), *Notice of the State Council on further Strengthening the Safe Production Work* (LHF [2010] No. 198), and *Emergency Notice on Handling Cold Wave and Ice/Snow Disaster* (LFMD [2010] No. 8), to allocate tasks and responsibility of operation safety to different administrations at different levels to safeguard forest workers and forest communities.

### 3.2 Policies, regulations and guidelines affecting employment in the forestry industry in China

#### 3.2.1 Forestry policy in China

In 2003, China has announced the *Decision of the CPC Central Committee and the State Council*
on Accelerating the Forestry Development (“the Decision”) which states explicitly: “forestry is one of the most important public utilities and basic industries, undertaking an important task of ecological development and forest products supply”; “(China will) build relatively well-rounded forest ecological system and relatively developed forestry industry system”. To build a more developed system in the forestry industry, the Decision also puts forward specific requirements for the development of forestry industry policies, including “optimizing the forestry structure, and promoting industrial development”, and “upgrading the industrial structure, and strengthening the implementation of guidance and regulation on the development of forestry industry”.

In 2011, the SFA released China’s forestry development’s 12th Five-Year Plan with the ambition to afforest 30 million hectares in five years and plant 12 billion trees nationwide through voluntary programs. By 2015, the forest coverage is targeted to reach 21.66 per cent with forest stock volume of 14.3 billion cubic meters; the total carbon stock of forest vegetation may reach 8.4 billion tons; land ecological security barrier will be initially formed; the forestry industry output will reach $555.6 billion; the proportion of special industries and emerging industries in the forestry industry will also have great increase; at the same time, the eco-cultural system will be initially constituted, and the concept of ecological civilization will be widely promoted.

Under the framework of forestry policies, the Chinese forestry sector has enormous development opportunities and green jobs creation potential, especially under the strategic targets of increasing “forest coverage” and “forest stock volume” and the guidelines of sustainable forest management.

3.2.2 Forestry industrial policy in China

To implement the Decision, State Forestry Administration, National Development and Reform Commission, Ministry of Finance, Ministry of Commerce, the State Administration of Taxation, China Banking Regulatory Commission and China Securities Regulatory Commission jointly developed the Key Points for Forestry Industry Policy (SFA, 2007), the first industrial policy for forestry industry. This document specifies employment issues in the process of transforming the forest industry to a resource efficient and environmental friendly industry. In particular relating to jobs and occupational safety and health, the document has highlighted the importance of
establishing training schemes for the forest workers and villagers and qualification scheme to enhance the capacity building of forest enterprise operators.

3.2.3 Policies and regulations regarding to logging

With the rising awareness on climate change and ecological development at the global and national levels, a number of factors are imposing greater impact on logging activities, including resource conservation, industrial development, ecological security and occupational safety.

After the UN Environment and Development Conference in 1992, the international community called for the development of forest management operating procedures, in which logging industry is the core area of concern. Prior to 2000, the Food and Agriculture Organization (FAO), the ILO, and the Asia-Pacific Forestry Commission developed respectively the Model Code of Forest Harvesting Practices, the Safety and Health in Forestry Work, and the Code of Practice for Forest Harvesting in Asia-Pacific, which were having worldwide reputation till now. These guidelines try to make a balance among the economic, ecological and social development, and promote the sustainable development of forests through strict control over forest consumption, reducing the negative impact of logging activities on forests and its ecosystem, upgrading logging techniques, and improving the efficiency of labour and timber utilization.

China formulated and published the Code for Forest Harvesting (“the Code”) in 2005. As the Chinese forestry harvesting industry standard, the Code refers to the Safety and Health in Forestry Work published by the ILO in 1998, so as to improve the health and safety operation of the forestry enterprises, prevent and reduce occupational disease or accident, and protect work safety of forest workers. It reflects the concept of ecological logging and work safety, puts forward the principles and requirements on harvesting operations for forest managers, forest management and harvesting operators, ensures the reasonableness, orderliness and safety of forest harvesting, provides quality and efficiency of harvesting operations, reduces the negative impact of logging on the environment and society, and speeds up the realization of forestry sustainable development process in China. Meanwhile, the provinces (autonomous regions and municipalities) can develop local standards or implementation details in accordance with the Code. The problems and special circumstances found in the implementation process should be reported to relevant departments at a higher level.
The *Code* is considered as a significant advancement in the forestry sector in China. First of all, the *Code* specifies productive harvesting of traditional timber in the eco-logging mode for the first time; secondly, it is the first guideline that proposes the shift from timber-focused logging to the whole process of forestation, for example, it converts the traditional logging operation which is primarily targeted at timber production to the eco-logging operation, taking into account the ecological environment protection and the implementation of sustainable forest ecosystems; moreover, the protective and preventative measures for operation are emphasized in the standard; Last but not least, referring to the international standards, the labour protection, safety in production operations, and the operating time are specified in the *Code* so as to improve working conditions, reduce work-related injury, promote social harmony, and enhance the economic efficiency of forestry enterprises.

The *Code* also clarifies the physical ability requirements for logging workers, qualifications, and the appropriate composition of harvesting and operating team, and specifies the measures on work security and venue hygiene during the whole process of harvesting. For example, it is suggested to reduce fuel consumed by forest harvesting machines and oil overflow, and strengthen the recovery and processing of wastes; the operating personnel should be equipped with necessary safety equipment and protective clothing; and the living areas should be equipped with sanitary requirements; and others (Wang and Tang, 2011). Some examples of the impact of the *Code* could be found in Box 1.

**Box 1: the impact of the *Code for Forest Harvesting* in China**

Since the issuance of the *Code for Forest Harvesting* in China in 2005, the *Code* has helped to:

- improve the management of harvest industry, increasing the effectiveness by 25 per cent and reducing the accident rate by 50 per cent;
- reduce the negative impact on nature by applying sustainable timber harvest measures and reduce at least 5 per cent of the cost in forest regeneration;
- integrate the factors of forest protection and labor protection into the conventional logging system, which can ensure the development of the industry in a sustainable manner; and
- integrate the international standards into the Chinese forestry management system which starts to be recognized by the international community.

3.2.4 The Guide on Sustainable Management of China’s Forests

In 2006, the SFA released the *Guide on Sustainable Management of China’s Forests* (“the Guide”). Based on the forest ecosystem management theory, it highlights the increase of forest productivity and forestland utilization, the protection of biodiversity, and the improvement of forestry development environment, and promotes the sustainable development of China’s forestry sector.

The *Guide* also emphasizes the enhancement of awareness and capability of public participation through strengthening publicity and training on relevant forestry policies and regulations for local government officials, forestry workers, non-governmental organizations and forestry farmers. Especially, the emphasis is put on strengthening the technical training and relevant policies training for women and minority residents to improve their ability to participate in the forestry development.

The *Guide* encourages the participation of indigenous peoples in the forest management, requires local authorities to protect and respect the rights of traditional and local forest users, and promote economic development and social employment in the forest areas.

The *Guide*, however, puts more emphasis on the field of environmental standards and criteria, while the standards of labour protection and occupational safety and health are less mentioned.

3.3 Forest certification schemes in China

Certification schemes provide independent validation of sustainability and assist consumers to purchase sustainable forest products, reward forest companies’ commitment to meeting high social and environmental standards, and thus encourage sustainable forestry practices (Durst et al., 2006). As of May 2011, the global area of certified forest under more than 50 certification programmes was 375 million hectares, mostly under two large umbrella certification programmes: the Forest Stewardship Council (FSC), with 148 million hectares of forest certified, and the Programme for the Endorsement of Forest Certification (PEFC), with 240 million hectares, with some areas holding both certificates (FSC, 2011; PEFC, 2011). Standards for
employment and decent work are promoted by most of the certification schemes, including the PEFC and the FSC, requiring compliance with national labour laws and international labour standards concerning freedom of association, collective bargaining, abolition of forced and child labour and non-discrimination as well as minimum safety and health rules. Some also recognize the rights of indigenous peoples (FSC, 2011; PEFC, 2011). In 2008, it is estimated that 2.13 million jobs were created globally because of different certification schemes (ILO, 2012).

At present, China’s national certification system is actively seeking for approval and cooperation of international certification schemes during the development process, and trying to integrate in the international standards.

China’s domestic forest certification schemes include: certification of forest management, Chain-of-Custody Certificate, bamboo forest certification, carbon sink forest certification, non-timber forest product certification, forest ecology environmental services certification, and certification for production and management of precious, endangered and rare species. China has also released various standards on forest management certification and the chain-of-custody certification. Among them, the forest management certification standard includes 9 principles, 45 criteria and 118 indicators. The standard highlights the protection of the rights of local communities and workers, the recognition of their rights to use and manage land and resources, the respects of the customs and habits of the local residents, and the enhancement of the long-term social and economic interests of workers and local communities.

Since 2007, China has formulated the certification standards such as the China Forest Certification-Forest Management and the China Forest Certification-Chain of Custody Certification, and is preparing eight other standards and technical guidelines. To accelerate the development of forest certification, in 2008, the national sustainable forest management and forest certification standardization technical committee was established. In 2009, China Forest Certification Implementation Rules was released, Zhonglin Tianhe (Beijing) Forest Certification Center was established, and the international mutual recognition of forest certification system

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6 The eight standards and technical guidelines include: bamboo forest certification guide, plantation certification guide, bamboo management certification audit guide, non-timber forest product certification audit guide, forest management unit operating guide, processing enterprises operating guide, forest ecological environmental services certification standard and audit guidance.
was launched. The SFA thus decided to set up the forest certification management team and China Forest Certification Committee (CFCC), released the *Guiding Opinions of the State Forestry Administration on Accelerating the Forest Certification*, and the *Guidance on Forest Operation Certification Assessment*, held the forest certification assessor training classes, launched the forest certification verification pilot projects, formulated forest certification market management measures, and submitted the membership application to the PEFC. In 2011, China officially became a member of PEFC’s National Management Organization.

In the early 2010, 20 organizations engaged in forest operation in China had obtained the forest management certification with the certified forest area of 1.6 million ha, and more than 1,179 wood processing enterprises were certified with the chain-of-custody certification. Among them, 1,096 enterprises were grated FSC certification, and 83 were certified by the PEFC (Wang *et al.*, 2011). According to the GHK Consulting (2007), certified forestry is considered as sustainable forestry, and the employment generated through certification schemes is regarded as green jobs. Considering Yang (2001)’s estimation on job creation on forestry management, one person is needed in forest management or forest protection for every 187–380 hectares of natural forests. From late 2007 to early 2010, forest management certification in China has at least generated 4210 green jobs in the forestry management positions. After the recognition between CFCC and PEFC, more forests in China are likely to be certified by the PEFC, which may induce more green jobs in the country.
4 Employment and decent work in the forestry industry in China

The forestry sector has great potential for employment expansion. According to the data released by the SFA in 2009, the total employment in China’s forestry industry reached 45 million full-time equivalents (FTEs) in 2008 (SFA, 2011a).

The logging sector only accounts for a small share of China’s forest industry. In accordance with the Forest Law and the measures issued by the SFA, logging operations can only be implemented by the state-owned enterprises and public institutions, collectively owned units and individuals who have obtained a logging license. By the end of 2009, 135 key state-owned forestry enterprises, 4,507 state-owned forests and 88,000 rural forest farms were allowed to have logging activities in the licensed areas.

China issued a logging ban of natural forests in 1998, which marked a transition of China’s forest policy from focusing on resource depletion into conservation. At the beginning of the implementation of this policy, China had suffered from the problem of increased unemployment in forestry with an estimation of above one million laid-off state forest workers (Yang, 2001) and more than 120 million local people in the rural areas were affected (SCC, 2002). A series of employment recovery measures were taken at that time. China started the conversion program from agro-land to forestland in 1999. In the following 12 years, China afforested an area of 28.5 million ha, which benefited 124 million villagers who earned income from afforestation and reforestation activities. These programmes also enabled the beneficiary to earn income from forest management in the following years. With governmental investment in the green economy in 2008, around 5.2-5.3 million new jobs would be created. 7 With the implementation of the national natural forest conservation program and other forest programs, China resettled around 30 million workers who were at risk of unemployment through major national forest programs (See Box 2 for example). 8 It demonstrated that, coupled with adequate employment policies and strong political will, the transformation to a green forestry sector not only could solve the

problem of job losses due to the restriction of logging, but also could create more decent work opportunities for forest communities.

**Box 2: The labour measures in the second phase of the National Natural Forest Protection Program (NFPP)**

China launched the second phase of investment in the natural forest protection program from 2011, aiming for a total investment of $38.7 billion investment by 2020 with the target of the new forest area of 5.2 million ha, forest stock of 1.1 billion cubic meters, and 416 million tons carbon sinks. The program is estimated to significantly reduce the area of soil erosion, increase biodiversity, and most importantly provide 648,500 jobs in the forest area. The Program will also provide subsidies and social insurance to forest workers, expand employment channels, increase jobs, and ensure the stability of existing jobs.


**4.1 Employment in the forestry industry**

**4.1.1 Employment type and quantity**

According to data released by the SFA in 2009, the total employment in China’s forestry industry was 45 million FTEs in 2008 (SFA, 2011a). The largest employer in the forestry industry is China’s six major forestry projects, including Converting Agricultural Land to Forest, the Natural Forest Protection Project, and the Three-North Shelterbelt Project, which have created a large number of forest plantation and management jobs. The planting of economic forests has also created a lot of employment opportunities, and solved the problems in the transformation of the rural labour force. In addition, in the context of climate change, a growing number of employment opportunities are emerging, including the employment created through afforestation and reforestation, the degraded ecosystem restoration, establishing the agroforestry system and strengthening the sustainable forest management. A cumulative additional 4.9 billion days of work (equivalent to 19.7 million work-years) were generated between 1999 and 2009 solely from plantation activities, in spite of agriculture job losses due to the conversion of
cropland to forests (see table 1).

Table 1 Plantation activities lead to employment growth in China (1999–2009)

<table>
<thead>
<tr>
<th>Year</th>
<th>Total forestation area</th>
<th>Plantation forestation area</th>
<th>Labour needed for plantation</th>
<th>FTE employment for plantation</th>
<th>Newly protected area for plantation purpose</th>
<th>FTE employment for protection</th>
<th>Forestation area by aerial seeding methods</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Million hectare</td>
<td>Million hectare</td>
<td>Million man-days</td>
<td>Million persons</td>
<td>Million hectare</td>
<td>Thousand persons</td>
<td>Million hectare</td>
</tr>
<tr>
<td>1999</td>
<td>4.90</td>
<td>4.28</td>
<td>427.69</td>
<td>1.71</td>
<td></td>
<td></td>
<td>0.62</td>
</tr>
<tr>
<td>2000</td>
<td>5.11</td>
<td>4.35</td>
<td>434.50</td>
<td>1.74</td>
<td></td>
<td></td>
<td>0.76</td>
</tr>
<tr>
<td>2001</td>
<td>4.95</td>
<td>3.98</td>
<td>397.73</td>
<td>1.59</td>
<td></td>
<td></td>
<td>0.98</td>
</tr>
<tr>
<td>2002</td>
<td>7.77</td>
<td>6.90</td>
<td>689.60</td>
<td>2.76</td>
<td></td>
<td></td>
<td>0.87</td>
</tr>
<tr>
<td>2003</td>
<td>9.12</td>
<td>8.43</td>
<td>843.25</td>
<td>3.37</td>
<td></td>
<td></td>
<td>0.69</td>
</tr>
<tr>
<td>2004</td>
<td>5.60</td>
<td>5.02</td>
<td>501.89</td>
<td>2.01</td>
<td></td>
<td></td>
<td>0.58</td>
</tr>
<tr>
<td>2005</td>
<td>3.64</td>
<td>3.22</td>
<td>322.13</td>
<td>1.29</td>
<td></td>
<td></td>
<td>0.42</td>
</tr>
<tr>
<td>2006</td>
<td>3.84</td>
<td>2.45</td>
<td>244.61</td>
<td>0.98</td>
<td>1.12</td>
<td>2.9-6</td>
<td>0.27</td>
</tr>
<tr>
<td>2007</td>
<td>3.91</td>
<td>2.74</td>
<td>273.85</td>
<td>1.10</td>
<td>1.05</td>
<td>2.8-5.6</td>
<td>0.12</td>
</tr>
<tr>
<td>2008</td>
<td>5.35</td>
<td>3.68</td>
<td>368.43</td>
<td>1.47</td>
<td>1.52</td>
<td>4-8.1</td>
<td>0.15</td>
</tr>
<tr>
<td>2009</td>
<td>6.26</td>
<td>4.16</td>
<td>415.63</td>
<td>1.66</td>
<td>1.88</td>
<td>4.9-10.1</td>
<td>0.23</td>
</tr>
<tr>
<td>Total</td>
<td>60.45</td>
<td>49.21</td>
<td>4919.31</td>
<td>5.57</td>
<td>5.69</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Source: ILO/UNEP/IOE/ITUC, 2012

The secondary industry\(^\text{10}\) also creates many job opportunities in the forestry sector. In 2009, 35,000 companies involved in wood-based panels and related industries, employing 10 million people directly and inducing indirect employment of about 35 million rural workers (Zhang et al., 2011).

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9 Considering that many forestation jobs are mostly informal and based on seasonal activities with working hours that are heavily dependent on temperature, weather and other environmental concerns, the labour volume for plantation activities should, in fact, create more short-term job opportunities.

10 It includes timber production and processing, as well as the processing of bamboo products, home furnishing manufacturing, and the production of forest chemical products.
The tertiary industry of China’s forestry, including the transportation and trade of forest products, as well as forest tourism and other forest service derivatives, provides large proportion of employment opportunity as well. Among them, national forest parks in 2001 received 83 million tourists, earning revenue of $7.94 billion and creating 3.5 million jobs directly and indirectly (SFA, 2011a). In 2008, the forest parks in China created 134,000 services and management jobs across the country, roughly three times higher than that of 1998 (CASS and IUE, 2010).

Table 2 Statistical data of practitioners in State-owned Units of China’s forestry system (2006-2009)

<table>
<thead>
<tr>
<th>Key indicators of practitioners in state-owned units in forestry system</th>
<th>2005</th>
<th>2006</th>
<th>2007</th>
<th>2008</th>
<th>2009</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of workers at the end of the year</td>
<td>1424048</td>
<td>1394450</td>
<td>1374843</td>
<td>1325304</td>
<td>1316405</td>
</tr>
<tr>
<td>Forestry</td>
<td>1218911</td>
<td>1182713</td>
<td>1167028</td>
<td>1124066</td>
<td>1109712</td>
</tr>
<tr>
<td>Timber and Bamboo logging</td>
<td>504416</td>
<td>478235</td>
<td>469124</td>
<td>432569</td>
<td>422307</td>
</tr>
<tr>
<td>State-owned forest</td>
<td>363573</td>
<td>356870</td>
<td>358408</td>
<td>358038</td>
<td>355516</td>
</tr>
<tr>
<td>Industry</td>
<td>51788</td>
<td>41177</td>
<td>32617</td>
<td>31658</td>
<td>27883</td>
</tr>
<tr>
<td>Wood processing, bamboo, rattan, palm fibre, grass fabrication</td>
<td>31345</td>
<td>24940</td>
<td>20251</td>
<td>13753</td>
<td>9234</td>
</tr>
<tr>
<td>Forest chemical product manufacturing</td>
<td>2200</td>
<td>1597</td>
<td>1095</td>
<td>917</td>
<td>1116</td>
</tr>
</tbody>
</table>

Source: SFA, 2011a

In China, the formal employment accounts much less than the informal employment\(^{11}\), including the short-term and/or seasonal employment, informal workers without signing labour contract, and a large number of individual forest practitioners. According to Forestry Yearbook 2006-2010,

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\(^{11}\) Informal employment is defined by ILO in 2004 as informal employment as comprising the total number of informal jobs, whether carried out in formal sector enterprises, informal sector enterprises, or households, during a given reference period. In this report, we group the employment without contract and without insurance into the informal employment.
the number of formal employment in the state-owned forestry system is less than 3 per cent of the total number of workers in the forestry industry, excluding collective enterprises and individual self-employed practitioners (see Table 2). It must be noted that, many practitioners are temporarily employed or seasonally hired for specific forestry activities due to the nature of forestry activities. These informal workers work under deplorable working conditions, with low pay, and lack of job security or health and safety protection.

Figure 8 indicates that the employment in the state-owned forest entities had been declined from 2005 to 2009. In the national strategy for forest industry development, however, total employment in forest industry is targeted at an increase from 45 million in 2008 to 57 million by 2012. Informal employment, which is much more flexible, is estimated as the main form of the employment in China’s forestry industry. It is also suggested that data quality on informal employment should be improved and international cooperation for data collection is requiring for further analysis.

![Figure 8 Employment in state-owned units (2005-2009)](image)

Source: SFA, 2011a

### 4.1.2 Occupational safety and health

It is observed that China’s forestry industry had been transformed from logging oriented to focus more on forest protection and wood processing. Most of the highly dangerous and hazardous factories and enterprises have been shut down and the occupational risk for forest workers has been reduced accordingly. However, since most forest workers work mainly in remote regions, logging, wood transportation, forest fire and fieldwork are considered as major risks; while in the
wood processing companies, risks are pretty high in the improper operation of equipment, especially when there are not sufficient labour protection measures and proper pre-duty training. Table 3 shows rather high injury numbers in the state-owned forest farms and timber and bamboo forest harvesting sectors in the forest industry in China.

Table 3 Statistics on casualties and accidents of workers by sectors in the forestry system in 2009

<table>
<thead>
<tr>
<th>Casualties and accidents of forestry workers by sectors</th>
<th>Minor injury (person-time)</th>
<th>Serious injury (person-time)</th>
<th>Death</th>
</tr>
</thead>
<tbody>
<tr>
<td>Agriculture, forestry, animal husbandry, fisheries, and sideline production</td>
<td>670</td>
<td>92</td>
<td>99</td>
</tr>
<tr>
<td>State-owned forest</td>
<td>69</td>
<td>19</td>
<td>40</td>
</tr>
<tr>
<td>Timber and bamboo forest harvesting</td>
<td>575</td>
<td>62</td>
<td>7</td>
</tr>
<tr>
<td>Mining industry</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Manufacturing</td>
<td>24</td>
<td>2</td>
<td>-</td>
</tr>
<tr>
<td>Wood processing, bamboo, rattan, palm fibre, and grass product manufacturing</td>
<td>24</td>
<td>2</td>
<td>-</td>
</tr>
<tr>
<td>Forest chemical product manufacturing</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Special equipment, instrumentation manufacturing</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Building materials manufacturing and processing</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Other manufacturing</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Construction industry</td>
<td>1</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Other</td>
<td>27</td>
<td>8</td>
<td>8</td>
</tr>
<tr>
<td>Total</td>
<td>722</td>
<td>102</td>
<td>107</td>
</tr>
</tbody>
</table>

Source: SFA, 2011a

In 2001, China has issued the Code for Occupational health and safety, which is a governmental recommendation without mandatory effect. It is found that some forest enterprises have been practicing this standard and organize their management systems in terms of occupational health and safety. However, data is limited on the actual effect of this code on the improvement of working conditions in the forest industry as a whole. For the wood processing industry, the Code for occupational health and safety for wood processing is still being drafted.

4.1.3 Income, working hours and social insurance

According to China Forestry Yearbook the statistics on labour remuneration of workers in
state-owned units of the forestry system, in 2009, the annual average wage of forestry workers was $2,855 (see Table 4). Figure 9 shows that the remuneration of workers in state-owned entities has been increased, although the increase of remuneration is partly due to inflation. Most of the informal practitioners get paid on a piece-rate basis or hourly pay, and there is no fixed income distribution system for these workers.

**Figure 9 The annual income for worker in state-owned units, 2005-2009 (USD)**

Source: SFA, 2011a

In general, the remuneration for the state-owned forest units is less than in other industries. Comparing the remuneration data of state-owned forestry units with the average income of China’s urban workers, it is shown that the income of the forestry workers is less than the average income of the urban workers (Figure 10). However, the average annual salary of forest workers in the NFPP areas within the Yangtze and Yellow river districts was $2,530 per person in 2008, almost three times higher than in 1999. This increase is mainly due to public transfers and employment stimulus packages (SFA, 2011b).

**Table 4 Statistics on labour remuneration of workers in State-owned Units of the forestry system from 2005 to 2009 (USD)**

<table>
<thead>
<tr>
<th>Labour Remuneration of practitioners in state-owned units in forestry system</th>
<th>2005</th>
<th>2006</th>
<th>2007</th>
<th>2008</th>
<th>2009</th>
</tr>
</thead>
<tbody>
<tr>
<td>The annual average salary of workers on duty</td>
<td>1480</td>
<td>1699</td>
<td>2153</td>
<td>2519</td>
<td>2855</td>
</tr>
<tr>
<td>Forestry</td>
<td>1341</td>
<td>1490</td>
<td>1887</td>
<td>2179</td>
<td>2476</td>
</tr>
<tr>
<td><em>Timber and bamboo logging</em></td>
<td>963</td>
<td>1085</td>
<td>1432</td>
<td>1660</td>
<td>1909</td>
</tr>
<tr>
<td><em>State-owned forest</em></td>
<td>1391</td>
<td>1531</td>
<td>1905</td>
<td>2137</td>
<td>2391</td>
</tr>
</tbody>
</table>
According to a sample survey, formal forestry workers in China normally work eight hours per day in average, while some are found working 1-2 additional hours, indicating that the labour intensity is relatively high in the industry. For some private enterprises, most of the payment is mainly performance-based, which means that workers get paid by pieces of work. The system provides strong incentives for workers to work overtime in order to earn more money (Wang et al., 2010). The working environment of informal workers is generally worse than that of formal workers.

**Figure 10 Comparison on remuneration of worker in state-owned forest units with average income of urban workers, 2008-2009 (USD)**

![Graph showing remuneration comparison](image)

Source: SFA, 2011a; National Statistics Bureau, 2009–2011

### 4.1.4 Social protection

Formal forest workers, especially those in the State-owned enterprises, have the same protection under Chinese social security system as workers in other sectors. Taking the NFPP for example, redundant workers, who voluntarily terminated their employment contracts and resettled themselves, received a lump sum of up to three times their average annual wages of previous
years. Some of them could be placed in jobs supporting the afforestation plan, such as forest protection, plantation and management, rural infrastructure and public facility construction projects. They also received assistance to establish their own businesses. Older workers were offered early retirement while younger ones could opt for education and training programmes through employment service centres and were supported in finding employment elsewhere. Unemployment support is also provided to cover minimum living expenses and medical care (MOHRSS, 2011).

Informal workers generally do not sign long-term labour contracts. According to a survey on employment in SMFEs in China done by Luo et al. (2009), 43 out of 108 enterprises surveyed, did not issue employment contracts to their workers. For those who issued contracts, the duration generally did not exceed three years.

In terms of medical care, most of the informal workers in China, like the vast agricultural populace, are able to participate in the new rural cooperative medical system (the “NCMS”). The NCMS which involves the voluntary participation of farmers and is funded by the individuals, collective and government, focuses mainly on comprehensive arrangements for serious diseases with mutual aid under the organization, guidance and support of the government. However, the NCMS can only be applied to medical treatment and reimbursement in designated hospitals, so the informal workers who are working outside their home province have difficulty in benefiting from the NCMS.
In addition, the Chinese government has formulated some macro-policies in succession with regard to forest workers’ immediate interests. For example, the competent ministries and commissions of the State Council have formulated and issued policies and documents regarding participation by workers involved in land reclamation and cultivation enterprises in basic old-age insurance, “the change of rural residency of workers and families involved in land reclamation and cultivation enterprises into urban residency.” It also grants agricultural and forestry workers the rights to income security, and has provided social insurance to 500,000 forestry workers at mixed posts by the end of 2007 (ACFTU, 2007).

4.1.5 Skills and training of forestry workers

At present, there are some training opportunities for Chinese forestry workers. According to a sample survey by Wang et al. (2010), 81 per cent of formal workers got trained and educated, whereas informal workers have few opportunities to receive education and skills training. The SFA has recently released the 12th Five-Year Plan on National Forestry Education and Training to improve the labour skills of forestry workers. The Plan is aiming at further improving the modern forestry education and training system which could well serve the development of modern forestry sector and the labour force requirements in the green economy. The total scale of the forestry industry training is planned to reach 20 million people, aiming at enhancing their leadership skills and technical skills to meet the needs of forestry development. According to the

**Box 4: Social protection for local farmers affected by the logging ban in China**

A variety of social measures targeted local farmers affected by the logging ban:

- farmers were granted full private ownership of the products grown on their contracted farmland;
- the lease period of farmland was extended to 70 years or more;
- tax exemption was granted for non-wood forest products;
- grain, cash and subsidized tree seedlings were offered as incentives for afforestation (from 2007, for every hectare of afforestation, local participants are subsidized annually by a maximum of US$207 in cash plus a US$39 living allowance); and
- training and technical services were offered to improve participants’ skills in plantation, irrigation, new technologies application and forest management.

Source: ILO/UNEP/IOE/ITUC, 2012
Plan, to improve the quality of forestry practitioners, the objective is to train 5 million forestry leaders, managers, professional and technical workers, 5 million forestry workers and 10 million forestry farmers. According to the plan, the SFA will allocate funding for priority training programs, and the forest entities, including the enterprises should allocate resources, equalling to 1.5-2.5 per cent of the worker’s salary to provide necessary skills trainings for their workers. However, the outcome of skills trainings was not well reported and evaluated (Qiu, 2010).

4.2 Decent work challenges

4.2.1 Employment discrimination

The ILO’s Discrimination (Employment and Occupation) Convention, 1958 (No.111) aims at realizing equal employment opportunities and equal treatment for all workers. China ratified this Convention in 2006, and enacted the Employment Promotion Law in 2008 to promote equal employment.

Forestry employment discrimination is rarely reported in China, but employment discrimination is possible due to remuneration bias. Temporary workers without long-term contracts are very likely to get less compensation, benefits and pay than the worker with a formal contract. Moreover, informal workers are normally not included in recruiting companies’ insurance schemes.

4.2.2 Gender equality

A number of ILO Conventions provide legal and institutional frameworks conducive to promote gender equality, including: the Equal Remuneration Convention, 1951 (No. 100), which requires equal pay for work of equal value by men and women; the Discrimination (Employment and Occupation) Convention, 1958 (No.111), which promotes non-discrimination in employment and job posts. China ratified these two conventions in 1990 and 2004 respectively. The Employment Promotion Law was issued later to protect men and women’s equal labour rights.

In forestry industries, the male dominance of forestry value-chains and the lack of land rights for women and low literacy rates among rural women impede women’s employment in the industry, especially in the logging industry. In the woodland contracting, although there are provisions that
forbid the deprivation and restriction of women’s right of forest land contracting, women often lose their benefits in the imbalance of forest land distribution in reality. In rural areas in China, the woodland is distributed primarily to male householders, while married women and divorced women are often excluded from the distribution, which contributes to gender inequity in the forestry industry to a certain extent.

4.2.3 Forced labour and child labour

Forced labour refers to the behaviour of forcing any person to engage in any non-voluntary labour or services under the menace of any penalty. It is one of the basic human rights of the workers not to be forced to work. ILO adopted the Forced Labour Convention (No. 29) and the Abolition of Forced Labour Convention (No. 105) respectively in 1930 and 1957. China also strongly opposes forced labour and has adopted the Labour Law of the People’s Republic of China and the Labour Contract Law of the People’s Republic of China.

The elimination of child labour is one of the basic principles of the ILO, as embodied in the Convention concerning Minimum Age for Admission to Employment, 1973 (No. 138) and the Convention on the Prohibition and Immediate Action for the Elimination of the Worst Forms of Child Labour, 1999 (No. 182). China ratified the two conventions respectively in 1999 and 2002, and ratified the Labour Law of the People’s Republic of China and issued the Regulations to Prohibit the Use of Child Labour.

Forced labour and child labour were not reported in the forestry industry. As the labour remuneration of the informal forestry workers is based on performance, there is certain voluntary overtime work; in addition, in the forestry production by families, the collectives and individuals, there are certain possibilities for children to informally involve in the forestry work for their families. More research is required on this dimension of labour in China.

These are examples of challenges faced in terms of fair employment issues. There are some more decent work deficits and challenges throughout the analysis of the report, which are summarised in Chapter 5.

4.3 Trade unions and social dialogue
Social dialogue entails all types of negotiation, consultation or simply exchange of information among the government, employers and worker representatives. In China, the “Tripartite Mechanism” is an important manifestation of social dialogue. In 2001, the MOHRSS, All-China Federation of Trade Unions and the China Enterprise Confederation/China Enterprise Directors Association jointly established a tripartite meeting system in coordinating labour relations at the national level. Tripartite mechanism established in China aims to promote economic and enterprise development through the coordination of labour relations, maintain social stability, conduct communication and consultation on major issues concerning the fundamental interests of the enterprises and workers on a regular basis, and promote the democratization of labour rights. It also plays an important role in the process to reduce and resolve national conflicts. In the tripartite mechanism, the government representatives come from the labour administrative departments’ representatives. Employers’ representatives mainly include members from the non-governmental chamber of commerce, the individual operators association, the Young Entrepreneurs Association and the Association of Women Entrepreneurs. In China, the Federation of Trade Unions at all levels participates in the tripartite mechanism on behalf of workers.

The National Committee of the Chinese Agricultural, Forestry and Water Conservancy Workers’ Union (CAFWCWU) is the legal workers’ union for agricultural and forestry industry. By the end of 2007, there were 10 million union members in the CAFWCWU. In recent years, the CAFWCWU has been working with the SFA to formulate and issue documents on “strengthening workers’ democratic management and promoting re-employment” (ACFTU, 2007). It has also been involved in various reforms related to disaster relief and construction of public health services; the standardization process of old-age insurance operation system, enlarging the coverage of medical insurance, the implementation of income security policies and others. From 2001 to 2007, the CAFWCWU submitted 89 proposals to the National People’s Congress, 110 motions to the Chinese People’s Political Consultative Conference, of which, 40 directly consider improving the lives and working conditions of workers and benefitting workers’ primary interests (ACFTU, 2007).

The tripartite mechanism in the forestry sector has also reflected in related policy documents. For example, the Guide on Sustainable Management of China’s Forests requires the industry to
coordinate and balance the interests of relevant interest groups in forest management, especially in the interests of forest dwellers, and promote participatory forest management; China forest certification standards also encourage workers to participate in business decision-making, and guarantee their legitimate rights and interests.

### Box 5: Concrete actions and results of the CAFWCWU

- **Re-employment promotion.** Vigorous actions have been taken to urge relevant departments to carry out various re-employment policies, and provide employment services. Trade unions have been guiding workers to develop independently-operated economic models that are of advanced, large-scale and intensified feature. Until the end of 2007, the total value of output operated independently by workers in agricultural and forestry sectors throughout the country reached more than $6.35 billion, with an annual net income amounting of more than $3.17 billion contributed by 3 million people.

- **Aids and social insurance.** Trade unions at various levels in the forestry sector also provided aid to workers in financial difficulty, such as aid-the-poor funds; assisting governments to establish social security for workers and supervising enterprises to establish various basic social insurances for workers.

- **Promoting skills enhancement.** Together with the SFA, the CAFWCWU has launched the campaign of technical innovations in the forestry sector at the national level. The vast majority of forestry workers have participated. Proposed suggestions have totaled 290 thousand, with more than 130 thousand being adopted, creating an economic benefit of $2.05 billion and saving and creating value of $74.6 million. These activities have forcefully contributed to the enhancement of workers’ technical skills and facilitated the development of forestry enterprises.

- **Democratization on business management model.** Under the Work Rules for Enterprise Trade Union Work issued by the All-China Federation of Trade Unions, the CAFWCWU positively facilitates the establishment and improvement of democratic management among enterprises and institutions in forestry sector, carries out factory affairs publicity system, labor contract system and equal consultation labour contract system, and constantly works to improve the rights protection mechanism.

Source: ACFTU, 2007

### 4.4 Forestry labour inspection: ILO principles and practices

ILO’s *Labour Inspection Convention, 1947 (No.81)*, clearly defines the labour inspection functions, scope of work, the institution setting of inspection authorities and their responsibilities,
and the employment eligibility, responsibilities and obligations of supervisors. The Convention is one of ILO’s four priority governance conventions, and has been ratified by 143 countries and generally welcomed by the member states. In 2005, ILO published Guidelines for Labour Inspection in Forestry, which address some of the main issues and general principles of labour standards and their inspection in the forestry section (from planting to logging). The guidelines are based on the principles contained in relevant ILO Conventions and Recommendations, and make use of existing interpretations of these, in particular the ILO code of practice Safety and health in forestry work, Social criteria and indicators for sustainable forest management: A guide to ILO texts and Approaches to labour inspection in forestry: Problems and solutions. The guidelines also provide suggestions on workers’ organization and bargaining power, prohibition of forced labour and child labour, equal employment opportunities, reasonable remuneration, occupational safety and health protection, working conditions and skills training, and others.

In China, the State Council announced the Labour Security Supervision Regulations in 2004, which specifies that the labour and social security administrative departments of the State Council are in charge of the country’s labour security supervision work, monitoring the employers’ development of internal rules and regulations on labour and social security; employers and workers should comply with labour contracts; employers should be in compliance with the ban on child labour; employers should be in compliance with the provisions of special labour protection of women and juvenile workers; employers should be in compliance with regulations on working hours, rest and leave; employers should pay wages to workers and follow the minimum wage standards; employers should participate in social insurance and pay social insurance premiums for their workers; and employment agencies, vocational skills training institutions and vocational skills assessment accreditation bodies should provide vocational skills training and vocational skills assessment.

China’s labour inspection department’s functions include the labour security supervision and the occupational safety and health monitoring. Labour security supervision is the responsibility of the MOHRSS, and mainly includes the implementation of laws and regulations on employment, labour relations, wages, working hours, female workers and juvenile workers labour protection and social insurance and other related matters. Occupational safety and health surveillance is the
responsibility of the SAWS, and mainly includes overseeing the enterprise’s implementation of the Production Safety Law and Occupational Disease Prevention Law.

The labour inspection and occupational safety and health monitoring in the forestry sector are implemented by the relevant labour inspection departments and production safety supervision departments in accordance with the law. However, forestry workers are geographically dispersed and mobile in a variety of temporary and scattered worksites. Labour inspectors face the problems of access to the workforce coupled with the lack of modern transport and funds, which greatly hinders effective implementation of labour inspection. At the same time, due to a large amount of informal workers in the forestry industry, it is more difficult to organize comprehensive labour inspection.

4.5 Application of ILO forestry occupational safety and health practice guidelines in China

ILO’s Code of Practice: Safety and Health in Forestry Work (1998) was designed to provide guidance to the ILO’s constituents to improve the standards of forestry industry or enterprises on occupational safety and health, thereby reducing the accident rate of forestry workers caused by occupational diseases and work-related injuries. The code is based on state-of-the-art international experience, and is intended to be relevant and practicable in most countries and enterprises. It contains useful ideas even for countries and enterprises with well-developed prevention strategies, but is especially valuable for those that lack relevant regulations and guidelines.

The ILO cooperated with the SFA and helped China to formulate a series of standards to promote the safety and occupational health in the forestry industry. The ILO Beijing office had organized pilot training courses in Simao and other regions and promoted the application of the Code of Practice 1998 in China.

timber felling operations, and made provisions for job security and venue sanitation from the aspects of production safety, security management and labour protection. General Rule for Timber Harvesting and Transportation Security provides the basic safety rules and requirements for timber harvesting, skidding, deck- ing-up in felling area, the cutting area loading, and wood transportation by truck, railway and waterway. Technical Code for Occupational Health in Wood Processing Enterprises is the first standard compiled by the SAWS to regulate the occupational health and safety management in the wood and wood product industry.
5 Suggestions to promote decent work in the forestry industry

China is actively advocating the development of a green economy and building a resource-saving and environment-friendly society. During the process to address climate change, protect the ecological environment and promote green economic development, China’s forestry economy, while maintaining steady and rapid development momentum, is creating more and more decent work, which has reflected the dual concept of environmental sustainability and decent work in forestry industries. Meanwhile, there are a number of problems and challenges in promoting the green development of China’s forestry sector and improving decent work in the overall level in the sector. In the short run, it is still necessary to vigorously develop the forestry economy as the main orientation in advancing the forestry industry, and expanding the positive effects of green economic development on the creation of decent work. At the same time, it is necessary to take positive measures to reduce unemployment and other adverse effects caused by the transformation to a green economy. Further, promoting decent work in the forestry sector is also essential in the development of sustainable forestry.

Throughout the report, challenges in China’s forestry industry have been highlighted as follows: 1) a large number of informal workers in the forestry industry work under deplorable working conditions with low pay and lack of job security and health and safety protection; 2) occupational risks for forestry workers are very high, especially for logging and wood transportation activities and due to forest fire and fieldwork; 3) informal forestry workers have difficulty benefiting from the formal health care system or the NCMS because most of them are not working in their home provinces; 4) employment discrimination is still a challenge especially for temporarily hired workers, who are very likely to get less pay, compensation and benefits than formal contracted workers; 5) gender inequality is still an issue of concern in the rural areas, where women lack land rights and have low literacy rates; 6) the possibility of child labour in family-based forestry work still exists; 7) labour inspection is difficult to implement due to the problems of access to the workforce and a lack of modern transport and the huge number of informal workers in the forestry industry. The following suggestions are proposed to address the above summary of challenges.
5.1 Promotion of decent work and green economic growth through enhancing publicity

The Chinese government has shown its strong political will in promoting green economic growth and the green job strategy through its 12th Five Year Plan. Green jobs in forestry are considered products of greening the economic development in the forest industry, and an important driving force to promote green economic development, which is conducive to promoting decent work. In order to realize a just transition to a green economy, China still needs to make efforts to conduct more in-depth study of the development of the green economy, promote the concept of decent work, promote the forestry industry, and take the implementation of decent work in forestry sector as a priority national strategy, and integrate it into the promotion of full employment and implementation of active employment policy in the forestry industry. It is also necessary to stress the importance of forestry enterprises in the promotion of decent work, with active participation from forest workers and general recognition from the whole society.

5.2 Promotion of decent work in forestry sector through supporting policies and standard based system

First, it is very important to support the further development of green industries, and refine the industrial policies in favour of decent work generation in the forestry sector; second financial support policies, such as credit systems and subsidies, could provide strong incentives to increase green employment in the forestry industry and accelerate the development of the forestry industry; third, forestry enterprises could be encouraged to create more and better jobs through abatement and reduction of taxation and administration fees, give low-interest loans to support the green entrepreneurship in the forestry industry, and stimulate employment through green entrepreneurship; fourth, government could also support the development of SMFEs in meeting the environmental protection requirements by lowering the bidding conditions for undertaking certain government procurements. In addition, the design and enforcement of ILO’s decent work standards on the basis of the current forestry industry standard could accelerate the promotion of decent work in China.

5.3 Improvement of the implementation of relevant laws and regulations

China has issued several laws and regulations in terms of labour protection and occupational
safety and health based on the Conventions and Recommendations from the ILO. While fully implementation of laws and regulations cannot happen without in-depth guidance, especially the guidance to improve the workplace, training and social dialogue particularly for the forestry industry, some guidelines and code of practices should be developed and upgraded further.

The coordination of different departments on inspecting the implementation of relevant laws and regulations is also of great importance. In the forest sector, there are several departments engaged in labour protection and occupational safety and health issues, while sometimes it is common to have conflicts of interests during the implementation. It is thus necessary to coordinate different departments and establish a channel for information sharing, dialogue and joint enforcement of certain laws and regulations. The role of the National Committee of the CAFWCWU should also be enhanced so that they can participate in the social dialogue process on behalf of the workers.

### 5.4 Improve the skill training for forest workers

Despite the training opportunities provided for Chinese forestry workers, the outcome and effectiveness of these training programmes needs to be evaluated in order to continuously improve the skill training system in the forestry industry in China. The ILO code of practice on Safety and health in forestry work provides a good basis for training.

### 5.5 Promotion of forest certification, and decent work in the forestry sector

Forest certification as a market-oriented approach is becoming one of the most important means to promote sustainable forest management; the forest certification standards include not only the requirements of the environmental protection, but also the requirements and principles of social equity and employment protection in the forestry industry. Currently, the forest certification system in China is springing up, and a series of industry standards have been adopted nationwide. It is foreseeable that the industrial standards will be implemented seriously under different forest certification schemes, and the enforcement of the social supervision will become an important measure to ensure decent work for workers in the forestry industry.
5.6 Establishment of informal employment database in the forestry sector

The employment in the forest plantation and SMFEs are estimated to increase in the future. A large number of potential and emerging jobs are very likely to be informal. However, there are no statistics and monitoring systems in place for collecting genuine data and information, and it is difficult for policy makers to understand informal employment in the sector, where the majority of the workers are informal and/or seasonal workers. Therefore, there is an urgent need to establish database of informal employment in forestry sector to monitor employment and working conditions in the informal sector.

5.7 Further research on employment challenges in Chinese forestry industry

As there is limited research and data on employment in forestry industry in China, further research is needed to identify means to improve working conditions and employment qualities in the process of long-term sustainable development in the industry.
6 Conclusion

Forestry is an important sector of the green economic transformation in China. Forests not only provide forest products for the economy development, but also shoulder the responsibility for environment security. China’s forest protection and utilization, and the sustainable management of forestry will develop very quickly in the future due to the big transformation from logging oriented to sustainable forest management focuses, which can create new employment opportunities despite of employment loss in the transition period.

With the development of forestry industry, China has already begun to pay attention to decent work environment, labour safety and security for practitioners in the field of forestry. However, due to the particularity of the work in forestry, the remuneration for the industry is still relatively low and lack of sufficient skills trainings. Even though China has systematic laws and regulations regarding to the labour protection and occupational safety and health, the implementation is less evaluated. Fully implementation of relevant laws and regulations will be the basics to make sure decent work in the forestry sector. Forest certification and other market based approaches could also provide the opportunity to promote decent work in the forestry sector in China.

It is suggested that further in-depth surveys should be considered to get first hand data and information on labour conditions, especially for the informal employment which accounts for a large share of employment in the sector, but less known and investigated by the academics, policy makers and the public at this stage. For a comprehensive understanding of the Chinese forestry employment and social security, more in-depth case studies are also needed for the next step of analysis.

Nevertheless, the information gathered and analyzed in this report already provides a basis for concrete action and further discussion.
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