



科思论丛



中国绿色就业研究

RESEARCH ON
GREEN EMPLOYMENT
IN CHINA

游 钧 张丽宾 等◎著



社会科学文献出版社
SOCIAL SCIENCES ACADEMIC PRESS (CHINA)



科思论丛

本书由中国劳动保障科学研究院资助出版

中国绿色就业研究

RESEARCH ON
GREEN EMPLOYMENT
IN CHINA

游 钧 张丽宾 等◎著



社会科学文献出版社
SOCIAL SCIENCES ACADEMIC PRESS (CHINA)

图书在版编目(CIP)数据

中国绿色就业研究/游钧等著. —北京: 社会科学文献出版社, 2014. 1

(科思论丛)

ISBN 978-7-5097-5345-3

I. ①中… II. ①游… III. ①劳动就业-研究-中国
IV. ①D669.2

中国版本图书馆 CIP 数据核字 (2013) 第 278662 号

· 科思论丛 ·

中国绿色就业研究

著 者 / 游 钧 张丽宾 等

出 版 人 / 谢寿光

出 版 者 / 社会科学文献出版社

地 址 / 北京市西城区北三环中路甲 29 号院 3 号楼华龙大厦

邮政编码 / 100029

责任部门 / 经济与管理出版中心 (010) 59367226

责任编辑 / 陈凤玲 于 飞

电子信箱 / caijingbu@ssap.cn

责任校对 / 王洪强

项目统筹 / 恽 薇

责任印制 / 岳 阳

经 销 / 社会科学文献出版社市场营销中心 (010) 59367081 59367089

读者服务 / 读者服务中心 (010) 59367028

印 装 / 三河市尚艺印装有限公司

开 本 / 787mm × 1092mm 1/16

印 张 / 30.75

版 次 / 2014 年 1 月第 1 版


字 数 / 512 千字

印 次 / 2014 年 1 月第 1 次印刷

书 号 / ISBN 978-7-5097-5345-3

定 价 / 98.00 元

本书如有破损、缺页、装订错误, 请与本社读者服务中心联系更换

 版权所有 翻印必究

前 言

当前我国正处于重化工业的工业化中期阶段，资源短缺、环境恶化、气候变化的矛盾和压力十分突出。2008 年全球金融危机也对我国现有的经济发展模式提出了严峻的挑战，向可持续的经济社会发展模式转变显得更加迫切。危机后的世界各国，特别是发达国家，纷纷采取行动，实施绿色新政，通过投资绿色经济促进经济复苏、创造体面工作，通过促进绿色就业发展减少生存发展的环境压力和气候危机的威胁。我国应对危机出台的一揽子经济刺激措施中，也有相当一部分资金投资于绿色经济。“十二五”时期我国经济发展的核心任务是转变经济发展方式，向绿色、低碳经济转型，这既是世界经济社会发展的趋势，又是我国未来发展的客观要求。

事实上，从 20 世纪 70 年代开始，我国政府就日益重视环境保护工作，制定和实施了一系列政策措施，在 13 个重点行业关停淘汰落后产能；推进传统产业技术改造，提高能源利用效率，实现节能减排；提高资源综合利用水平，大力发展循环经济；加强环境污染治理，大力发展环保产业；加强生态农业建设，实施六大林业工程，增强碳汇能力；等。在这一过程中，一些就业机会被摧毁，一些新的就业机会被创造出来，一些工作岗位的技能要求发生了变化，还有一些就业机会被替代。值得特别强调和高度关注的是，2008 年金融危机后，各国失业率居高不下，创造就业成为各国政策的核心目标。温家宝总理指出：“就业是天大的事”；党中央国务院提出“要把就业工作放在更加突出的位置”，“实施就业优先战略”。作为一个占世界 1/4 就业人口、仍然有 40% 多的劳动力从事农业生产、就业的城市化率不到 40%、就业压力巨大的发展中大国，我们必须采取负责任的态度，处理好向绿色、低碳经济转型过程中的就业问题。

在我国制定国民经济和社会发展“十二五”规划前夕，我们于2009年开展了“中国绿色就业研究”，目的是在制定“十二五”发展规划的关键时期，促进我国经济发展方式转型，推动制定出台促进绿色就业发展的政策措施，完善我国更加积极的就业政策体系，促进我国经济、环境和就业的协调发展。同时，在当前全球气候变化谈判中，向国际社会介绍我国就业的基本情况，以及我国在推进绿色就业发展方面的实践和努力，从社会维度争取我国作为发展中国家的发展权力和发展空间，进而为尽可能地缓解我国本已严峻的就业形势创造空间。

作为关于中国绿色就业的初始性研究的成果，本书分别对绿色就业的国际研究情况进行了介绍，对中国发展绿色就业的法律和政策环境进行了分析，对太阳能热水器行业进行了价值链技术分析；就发电行业向绿色就业转型的经验、问题和做法进行了问卷调查研究。在上述研究的基础上，本书从绿色就业概念的理论探讨、绿色就业的宏观发展状况、向绿色就业转型的微观实践等方面，进行了初创性的研究探索。研究表明：在我国，绿色就业发展空间广阔，潜力无限，应有效地促进体面劳动；同时，向绿色就业的转型需要付出巨大的成本，我们应从我国经济社会发展的实际出发，采取措施，积极有效地促进我国绿色就业的发展。

本书分析了绿色就业的含义和本质属性，指明了绿色就业议题的实质和意义，并从总体上分析了发展绿色低碳经济影响就业的路径，以及我国绿色就业的现状；对我国已采取的促进绿色就业发展的政策措施进行了概括，并提出了较完善和可行的进一步促进绿色就业发展的政策措施建议。

在开展研究的同时，我们深深地感到这方面的研究工作只是开了个头，需要深入研究的方面还很多。首先，需要研究如何在全球气候谈判中发挥就业因素的作用。应对气候变化是为了人的发展，而迄今为止，在谈判中涉及的只是科技因素，包括限制气候升温的程度、减排指标等，而没有考虑人类发展指标。我们可以做些工作，将就业权、发展权纳入气候谈判框架中。其次，需要综述我国采取的发展绿色就业的政策措施。以前我们没有从这个角度考虑过，但实际上我们制定和实施了很多促进绿色就业发展的政策措施，付出了巨大的代价，承担了巨大的成本，也有很多政策创新。我们需要总结和宣传。再次，需要深入开展绿色就业发展的前瞻性研究。环境保护的就业影响是个复杂的过程，间接的就业效应往往大于直接的就业效应，单从某一点的直接影响难以判

断整体的就业效应。我们需要在建筑、交通、农业、基础工业等重点行业开展绿色就业研究，摸清绿色低碳发展对就业的影响，一方面为谈判提供论据支撑，另一方面也为我们制定政策、采取措施提供依据。我们已试验了价值链等分析技术，在开展重点绿色就业领域研究时也有技术方法保证。最后，需要开展促进绿色就业发展政策的前瞻性研究，完善我国的就业政策体系。我们已进行的研究仅能就促进绿色就业发展的总的政策提出一些建议，还需要研究不同行业促进绿色就业发展的具体政策。另外，促进绿色就业发展的政策是投资、财政税收等各种政策的综合，也需要研究综合性政策如何促进绿色就业的发展。就中国促进绿色就业发展的政策而言，需要在对现有政策总结、评估的基础上，进行前瞻性、应用性的探讨。

由于可资借鉴的资料有限，我们的研究本身还有很多不足之处，还有更多问题有待进一步深入研究。但是，为了展示中国绿色就业的研究及实践情况，我们仍愿意将我们的研究成果整理成书，以分享给更多的人。希望本书的出版能够有助于相关部门和领域的研究者、决策者、政策执行者进一步深化对绿色就业问题的认识并给予更多的关注，共同推动我国绿色就业的发展。

游钧 张丽宾

2013年9月23日

Preface

Currently, China is in the middle stage of industrialization, during which the conflicts due to and pressures from resource shortage, environmental deterioration and climate change are prominent. In 2008, the global financial crisis brought a severe challenge to the existing economic development model of our country, and the transition to a sustainable economic and social development model became more urgent. After the outbreak of the crisis, various countries in the world, especially the developed countries, all took actions to implement Green New Deal, specifically to promote economic recovery and create decent jobs by investing in the green economy, and to reduce the environmental pressure on and the threat of climate crisis to survival and development by promoting the development of green employment. As for China, among a package of economic incentive measures issued to cope with the crisis, there is considerable fund for investment in the green economy. In the period of the “12th Five-Year Plan”, the main task of economic development in our country is to transform the model of economic development into a green and low-carbon one, which is not only a trend in global economic and social development, but also an objective requirement for future development of China.

As a matter of fact, since the 1970s, our government has attached more and more importance to environmental protection by formulating and implementing a series of policies and measures. For example, the government has closed 13 key industries for eliminating backward productivity; promoted

the technological transformation of traditional industries, improved energy utilization efficiency and achieved energy saving and emission reduction; improved comprehensive utilization level of resources and vigorously developed circular economy; strengthened environmental pollution control and developed environmental industries rapidly; strengthened eco-agricultural construction, implemented Six Key Forestry Programs and strengthened the capacity of carbon sink, etc. During the process, some employment opportunities have been destroyed and some new ones created. Besides, the skills requirements for some jobs have changed and some employment opportunities have been replaced. It requires special emphasis that, since the financial crisis occurred in 2008, the unemployment rate in various countries has stayed high; and creating jobs has become the key policy goal in these countries. Former Premier Wen Jiabao once indicated, "Employment is a most important matter". The CPC Central Committee and the State Council also stated that the government should, "Put employment work in a more prominent position" and "Implement the strategy of the primacy of increasing employment". As a large developing country with working population amounting to 1/4 of the world's total, where as much as 40% of the labor force is still engaged in agricultural production, urbanization rate for jobs is less than 40% and employment pressure is great, we must be responsible and deal with the employment problem properly in the transition to a green and low-carbon economy.

On the eve of the drafting process for the "12th Five-Year Plan" for national economy and social development, we initiated "Research on Green Employment in China" in 2009. The purpose of the study is to provide a reference basis for policy-making in areas such as boosting the transformation of our economic development model, promoting the formulation and issuing of policies and measures for facilitating green employment development, improving employment policy system to make it more active and accelerating the coordinated development among economy, environment and employment. Meanwhile, in the current negotiations over global climate change, we shall

inform the international society about the basic employment situation in China and our country's practices and efforts in promoting green employment development. As a developing country, China must strive for its development right and development space, especially with respect to the social dimension, and alleviate the already severe employment situation in China.

As a preliminary study on green employment in China, this research summarizes international research on green employment, analyzes the legal and political environment for developing green employment in China, conducts technical analysis of the value chain of the solar water heater industry, and uses questionnaire surveys to study the experience, problems and actions in power industry's transition to green employment. On the basis of the above research, this report engages in preliminary exploration of theoretical questions about the concept of green employment, macroscopic development of green employment and the microscopic practices in the transition to green employment. The research results show that: in China, green employment has infinite potential and huge development space, which can effectively promote decent jobs. At the same time, the transition to green employment is costly, and we shall take active and effective measures to accelerate China's green employment development. On the basis of the actual situation of economic and social development in China.

The research analyzing and defining the meaning and essential attributes of green employment, pointing out the essence and significance of the issue of green employment, analyzing how the development of green and low-carbon economy influences employment as well as the overall situation of green employment in our country, summarizing the policies and measures already adopted for promoting green employment development, and raising relatively complete and feasible suggestions on policies and measures for the further promotion of green employment development.

While conducting the research, we deeply realized that research work on this subject has just started and there are still very much hard work to be done. For

instance, we need to study how to give play to the role of employment factors in the negotiations over the global climate. As we know, adapting to climate change is necessary for human development. However, so far, only technological factors, including the cap on temperature rise and emission reduction targets, have been covered in the negotiations while human development targets have never been considered. Thus we can work toward integrating employment right and development right into the framework of climate negotiations. In addition, we need to summarize the policies and measures China has adopted for developing green employment. Over recent years, we have never considered things from this perspective. In fact, we have formulated and implemented many policies and measures for facilitating green employment development, with heavy prices paid, huge costs borne but a lot of policy innovations made also. We need to summarize and publicize the results of these practices. Also, we need to develop the prospective study on green employment development. The impact of environmental protection on employment takes a complex process and indirect employment effects is usually greater than direct employment effects, thus it is difficult to judge the overall employment effect based only on the direct influence at a particular point. For this, we need to conduct research on green employment in key industries such as construction, transportation, agricultural and basic industries to find out the impact of green and low-carbon development on employment, which, on the one hand, provides theoretical support for climate negotiations and, on the other hand, offers basis for formulating policies and implementing measures. Since we have experimented with value chain and other analytical techniques, research on green employment in key fields will have guarantee with respect to technical methods. Finally, we need to conduct prospective study on policies for promoting green employment development and for improving the employment policy system in our country. As this report can only provide some suggestions on the general policy for promoting green employment development, we also need to study specific policies for promoting green employment development in the various industries. Additionally, since

the policies for promoting green employment development include policies in investment, finance and taxation, we must also study how comprehensive policies affect the development of green employment. As to China's policies for promoting green employment development, we need to make prospective and applicable discussions on the basis of summarizing and assessing the existing policies.

Due to limited information for reference, the research itself has several shortcomings and there are still many problems requiring further study. We hope that the publication of the book can help researchers, decision-makers and policy-executors in relevant departments and fields further deepen their understanding of and concern with the issue of green employment and promote the development of green employment in China.

You Jun and Zhang Libin
September 23, 2013

目 录

第一章 绿色就业研究概论 / 1

- 一 绿色就业的概念 / 1
- 二 我国绿色就业的发展现状 / 4
- 三 促进我国绿色就业发展的思路 / 9

第二章 中国绿色就业研究 / 14

- 一 中国研究绿色就业的背景 / 14
- 二 中国绿色就业的概念 / 18
- 三 中国绿色就业发展的法律、制度、政策环境 / 24
- 四 中国绿色就业的现状 / 31
- 五 发电企业向绿色就业的转型 / 40
- 六 促进绿色就业发展的原则和政策建议 / 77

第三章 绿色就业的国际研究 / 88

- 一 绿色就业的含义 / 88
- 二 国际环保产业政策 / 89
- 三 世界有关国家的低碳经济政策与措施 / 93
- 四 国外的可再生能源政策 / 99
- 五 能源利用和应对气候变化的绿色技术对中国就业的影响 / 103

- 六 中国劳动力状况对能源利用和应对气候变化工作的影响 / 105
- 七 社会伙伴对能源利用和应对气候变化的影响 / 105

第四章 中国绿色就业的相关法律政策 / 106

- 一 绿色发展的立法和政策体系框架 / 107
- 二 我国绿色发展的社会政治基础 / 107
- 三 环境保护相关立法 / 108
- 四 国家关于绿色发展的产业政策 / 111
- 五 绿色发展的主要目标和重点领域 / 114
- 六 与绿色发展相关的劳动保障政策 / 119

第五章 中国发展绿色就业的社会环境评估 / 126

- 一 中国促进绿色发展的经济政策 / 126
- 二 中国促进绿色发展的经济政策对就业的影响 / 133
- 三 中国促进绿色发展的公众意识 / 135
- 四 中国促进绿色发展的科学技术环境 / 137
- 五 中国促进绿色发展的社会支持体系 / 140

第六章 案例分析——德州市太阳能热水器产业价值链分析 / 142

- 一 研究背景 / 142
- 二 研究方法 / 143
- 三 德州市太阳能热水器发展的外部环境 / 146
- 四 德州市太阳能产业价值链的情况 / 148
- 五 改善太阳能热水器产业链的建议 / 159

参考文献 / 163

后 记 / 167

Contents

1 Introduction to Development of Green Employment

1.1	Concept of Green Employment	/ 175
1.2	Present Development Situation of Green Employment in China	/ 180
1.3	Ideas of Promoting the Green Employment in China	/ 190

2 Research on Green Employment in China

2.1	Background of Research of Green Employment in China	/ 203
2.2	Definition of Green Employment in China	/ 210
2.3	Legal, Institutional and Policy Environment for the Development of China's Green Employment	/ 219
2.4	Current Situation of China's Green Employment	/ 232
2.5	The Power Generation Industry's Transformation towards Green Employment	/ 243
2.6	The Principles and Policy Suggestions for Green Employment Development	/ 289

3 International Research on Green Employment

3.1	Definition of Green Employment	/ 311
3.2	International Industrial Policies on Environmental Protection	/ 313
3.3	Low-carbon Economic Policies and Measures in Selected Countries	/ 320
3.4	Renewable Energy Policies in Foreign Countries	/ 333
3.5	Influence of Energy Utilization and Green Technologies Used to Adapt to Climate Change on China's Employment	/ 341
3.6	Influence of China's Workforce Condition on the Energy Utilization and the Work of Adapting to Climate Change	/ 345
3.7	Influence of Social Partners on Energy Utilization and Adaption to Climate Change	/ 346

4 Laws and Policies for Green Employment

4.1	Framework of Legislations and Policy Systems for Green Development	/ 351
4.2	The Social and Political Foundation for China's Green Development	/ 352
4.3	Relevant Environmental Protection Legislations	/ 355
4.4	China's Industrial Policies on Green Development	/ 361
4.5	Main Objectives and Key Fields of Green Development	/ 367
4.6	Labor Protection Policy in Connection with Green Development	/ 378

5 Evaluation of Social Environment for Developing Green Employment in China

5.1	China's Economic Policies for Promoting Green Development	/ 395
-----	---	-------

5.2	Influence of China's Economic Policy for Promoting Green Development on Employment	/ 408
5.3	Chinese Public's Awareness of the Promotion of Green Development	/ 413
5.4	The Science and Technology Environment for China to Promote Green Development	/ 418
5.5	Social Supporting System for Promoting Green Development in China	/ 424

6 Case Study: Value Chain Analysis of Solar Water Heater Industry in Dezhou City

6.1	Research Background	/ 429
6.2	Research Methodology	/ 431
6.3	External Environment for the Development of Solar Water Heater Industry in Dezhou	/ 437
6.4	Overview of the Value Chain of Dezhou's Solar Energy Industry	/ 442
6.5	Suggestions for Improving the Solar Water Heater Value Chain	/ 462
	References	/ 467
	Postscript	/ 470

第一章

绿色就业研究概论

当前我国正处于重化工业的工业化中期阶段，资源短缺、环境恶化、气候变化的矛盾和压力十分突出。金融危机的爆发对我国现有的经济发展模式提出了严峻挑战，向可持续的经济社会发展模式转变显得更加迫切。金融危机后，世界各国特别是发达国家纷纷采取行动，实施绿色新政，通过投资绿色经济促进经济复苏、创造体面工作，通过促进绿色就业发展，减少生存发展的环境压力和气候危机的威胁。我国出台的一揽子经济刺激措施中，也有相当一部分资金投资于绿色经济。向绿色、低碳经济转型，既是世界经济社会发展的趋势，又是我国未来发展的客观要求。

实际上，我国政府一直重视环境保护工作，制定和实施了一系列的政策措施，在 13 个重点行业关停淘汰落后产能；推进传统产业技术改造，提高能源利用效率，实现节能减排；提高资源综合利用水平，大力发展循环经济；加强环境污染治理，大力发展环保产业；加强生态农业建设，实施六大林业工程，增强碳汇能力等。在这一过程中，一些就业机会被摧毁，一些新的就业机会被创造出来，一些工作岗位的技能要求发生了变化，还有一些就业机会被替代，最终导致就业的总量、结构、增量和就业形式发生变化。所以，向绿色、低碳经济的转型会对就业产生重大的影响。作为一个就业人口巨大的发展中国家，我们必须采取负责任的态度，处理好向绿色经济转型的就业问题。

一 绿色就业的概念

绿色就业是一个全新的研究领域，迄今为止，全球还没有被普遍接受的关