Economic and Social Commission for Asia and the Pacific

Sixty-seventh session
Bangkok, 19-25 May 2011
Item 3(b) of the provisional agenda
Review of issues pertinent to the subsidiary structure of the Commission, including the work of the ESCAP regional institutions: Trade and investment

Report of the Asian and Pacific Centre for Transfer of Technology

Note by the secretariat

Summary

The present report reviews the status of implementation of the programme of work as well as the administrative and financial status of the Asian and Pacific Centre for Transfer of Technology (APCTT) in 2010.

With over 30 years of experience in developing and popularizing methodologies and practices for facilitating technology transfer, strengthening national innovation systems, promoting South-South cooperation, information networking, and capacity-building, the Centre is making a concerted effort to assist the countries of the region in creating an environment that can strengthen the technology transfer and innovation management capacity of small and medium-sized enterprises.

In 2010, with funding from the Government of India, the Centre continued its work on promoting and strengthening national innovation systems in the Asia-Pacific region, and, in accordance with Commission resolution 64/3 of 30 April 2008 on promoting renewables for energy security and sustainable development in Asia and the Pacific, the Centre continued the activities that it had initiated in this area in 2009. During the implementation of its programme of work, the Centre paid special attention to countries with special needs and emphasized South-South cooperation initiatives. The Centre continued to leverage its well-established ICT-based networks to enable the use and sharing of knowledge relevant to technology transfer and to promote new and emerging technologies among member countries. The Centre’s APTITUDE Search Engine was further upgraded to enable the search of 15 Asia-Pacific technology databases in the public domain while its web-based periodicals, namely the Asia-Pacific Tech Monitor and the Value Added Technology Information Services (VATIS), continue to play an essential role in the dissemination and promotion of technology information and utilization in the region.
To leverage the gains made through its activities in 2010, the Centre has drawn up a programme of work for 2011 and the biennium 2012-2013, based on advice provided by its Technical Committee and Governing Council, to meet the emerging needs of the region. The Commission may wish to provide guidance on the strategic direction of the Centre as well as ways to overcome financial and staffing constraints.

Contents

<table>
<thead>
<tr>
<th>Section</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>I. Introduction</td>
<td>2</td>
</tr>
<tr>
<td>II. Results achieved and outcomes in 2010</td>
<td>2</td>
</tr>
<tr>
<td>III. Summary of the programme of work for 2011</td>
<td>4</td>
</tr>
<tr>
<td>IV. Administrative and financial status</td>
<td>4</td>
</tr>
<tr>
<td>V. Issues for consideration by the Commission</td>
<td>5</td>
</tr>
</tbody>
</table>

Annexes

<table>
<thead>
<tr>
<th>Annex</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>I.</td>
<td>7</td>
</tr>
<tr>
<td>II.</td>
<td>8</td>
</tr>
<tr>
<td>III.</td>
<td>10</td>
</tr>
</tbody>
</table>

I. Introduction

1. The Asian and Pacific Centre for Transfer of Technology (APCTT), a subsidiary body of ESCAP, was established on 16 July 1977. The Centre is located in New Delhi with host facilities provided by the Government of India. The objectives of the Centre, as defined in article 4 of its revised statute,¹ are to assist the members and associate members of ESCAP by strengthening their capabilities to develop and manage national innovation systems (NIS); to develop, transfer, adapt and apply technology; to improve the terms of transfer of technology; and to identify and promote the development and transfer of technologies relevant to the region.

II. Results achieved and outcomes in 2010

2. In 2010, APCTT conducted activities and substantive programmes as indicated below.

3. In July 2010, the Ministry of New and Renewable Energy of India provided APCTT with $250,000, for the period July 2010 – June 2012, to implement the project entitled “Establishing an institutional cooperation mechanism to promote renewable energy”. The project could help consolidate the Centre’s programme of work, which began in 2009 in accordance with Commission resolution 64/3 of 30 April 2008 on promoting renewables for energy security and sustainable development in Asia and the Pacific. As an initial activity, the project held a consultative meeting, in partnership with the Asian Institute of Technology, in Pathumthani, Thailand on 7 and 8 October 2010. At the meeting, which

¹ Commission resolution 61/4, annex.
included experts from participating member countries and key resource persons, the following topics were addressed: specific activities the Centre’s institutional cooperation mechanism could undertake to add value to other regional and global renewable energy technology networks; the identification of focal points working in the field of renewable energy, in member countries, to become partners of the regional network; and improvements in the Renewable Energy Cooperation-Network for Asia and the Pacific (RECAP) website to make it a more effective knowledge resource to member countries. APCTT also organized a Renewable Energy Business-to-Business (B2B) forum in Nanjing, China, in cooperation with the Nanjing International Technology Transfer Centre (NITTC), China on 14 November 2010 to facilitate discussions among renewable energy technology stakeholders in member countries on options for strengthening cooperation in technology transfer, business partnerships, and collaborative research and development.

4. In July 2010, the Centre initiated the second phase (2010–2013) of its project to promote NIS in the Asia-Pacific region with funding support in the amount of $321,750 from the Department of Scientific and Industrial Research of the Government of India. This second phase is aimed at going beyond awareness creation and sharing best practices, and focusing on key components, implementation strategies, and management practices of national innovation systems and their organic linkages with subnational and sectoral innovation systems. A key feature of the second phase entails the involvement of several countries with special needs, including Afghanistan, Bangladesh, Bhutan, Cambodia, the Lao People’s Democratic Republic, Myanmar and Nepal. Under the programme of work, a consultative workshop on Promotion of National Innovation Systems in Countries with Special Needs was held in Bangkok for senior policymakers on 19 and 20 October 2010, in partnership with the Ministry of Science and Technology of Thailand. In addition, the Centre organized, in partnership with the Indonesian Institute of Sciences, the Asia-Pacific Forum on Strengthening the Governance of National Innovation Systems, which was held in Jakarta on 24 and 25 November 2010, and a national workshop on linkages and partnerships among enterprises, research and development institutions and academia/universities to foster innovation and transfer of technology, which was held in Hanoi on 22 and 23 December 2010, in partnership with the Viet Nam Center for Technology Information Exchange, National Agency for Science and Technology Information.

5. APCTT commenced the development of a training manual on planning and implementing technology transfer to be used to train trainers in member States with the aim of creating a critical mass of skills to support and guide the technology transfer efforts of small and medium enterprises (SMEs) in the Asia-Pacific region. After a review of the pilot training programmes, the manual will be finalized and placed on the Centre’s website with free access to agencies in member countries which are involved in the building of technology-transfer capacity of SMEs.

6. In 2010, as part of its endeavour towards technology capacity-building, APCTT continued to strengthen its well-established and regionally accepted ICT-based networks, such as the www.technology4sme.net and www.business-asia.net, to enable the use and sharing of knowledge relevant to technology transfer and promote new and emerging technologies among member countries. The Asia-Pacific Technology Information Tracking and Unified Data Extraction (APTITUDE) search engine, designed by the Centre to support the
www.technology4sme.net website to search three databases in 2008, was further upgraded and programmed to search 15 public domain technology databases in the Asia-Pacific region, to enable online technology transfer services of APCTT to become a one-stop facility accessible to both consumers and producers of technology.

7. APCTT periodicals continue to play an essential role in the dissemination and promotion of technology information and utilization. Copies of the Centre's periodicals, the Asia-Pacific Tech Monitor and the Value Added Technology Information Services (VATIS) in the areas of ozone layer protection, waste technology, biotechnology, food processing, and non-conventional energy are currently distributed widely. In accordance with the suggestion made by the Governing Council of APCTT, these publications are now completely web-based and can be downloaded free of cost.

III. Summary of the programme of work for 2011

8. Given that the APCTT programme of work for the biennium 2010-2011 has the overall objective of strengthening the capacity of member countries to promote NIS and create an enabling environment for technology transfer to address regional development challenges, the Technical Committee and the Governing Council approved the following programme of work to commence in 2011 and to be included in the biennium 2012-2013.

   (a) Promotion of NIS in the Asia-Pacific region;

   (b) Strengthen innovation in research and development institutes in the Asia-Pacific region;

   (c) Build technology-transfer capacity in the Asia-Pacific region through training of trainer programmes;

   (d) Assist SMEs in adopting new and emerging technologies, including environmentally sound technologies;

   (e) Improve the skills of policymakers and entrepreneurs by promoting grass-roots innovations and traditional knowledge-based technologies in selected areas for inclusive development and social entrepreneurship;

   (f) Establish an institutional cooperation mechanism to promote renewable energy;

   (g) Make information on global technological policies, markets, innovations and events accessible to policymakers and decision makers.

IV. Administrative and financial status

9. While the work of the Centre has been commended by member countries, it is of concern that the annual contributions pledged by several member countries to APCTT have remained static over the last several years. Seeking to strengthen the financial base of the Centre in view of rising operational costs, the Governing Council of APCTT has urged member States to augment their contributions to APCTT in line with the
proposed indicative levels of $30,000 for developing countries and $7,000 for least developed countries.

10. The Government of India provides an annual contribution in rupees equivalent to US$200,000. In 2010, this amounted to 9,326,000 rupees. This fund is used for the emoluments of project and administrative support staff, utility services, the editing and development of APCTT periodicals, and maintenance costs. Despite having reduced the number of staff members at the Centre from 14 to 10 during a restructuring undertaken a few years ago and despite having kept the staffing level at nine in 2010, the annual rise in salary costs and operating costs suggests that the current contribution from the Government of India is insufficient to cover local costs. The appreciation of the Indian rupee will aggravate this problem further. Therefore, the Government of India is requested to kindly consider enhancing its contribution to the Centre so that operating costs can be covered.

11. In 2010, the Government of India commenced work to renovate and refurbish the APCTT building and premises. This work is expected to continue in 2011. This timely assistance is gratefully acknowledged.

12. APCTT continued to make efforts to strengthen its personnel infrastructure in view of its programme of work, its targets, the quality of services to be rendered and the timely action required. There is a great need for more staff at the professional and managerial levels. However, there is no financial provision under the current institutional set-up for the medium-term employment of professional staff. Hence, APCTT seeks the support of member countries in placing non-reimbursable loan (NRL) experts. The Centre also seeks the active cooperation and support of member countries to take this forward.

V. Issues for consideration by the Commission

13. The Commission may wish to consider the following issues and provide guidance to enhance and sustain institutional and programme funding for the Centre on a long-term basis:

(a) Enhanced institutional support. Increased funding is needed to meet the increasing operating costs to ensure effective delivery of services. The Centre has consistently upgraded existing facilities in an incremental manner using the limited resources available. During the biennium 2010-2011, it has continued to upgrade its information technology infrastructure. While the Executive Secretary of ESCAP writes to the seats of government to seek enhanced contributions for its regional institutions, including APCTT, guidance is requested from the Commission on supplementary approaches that may be taken to obtain enhanced annual financial contributions in line with the proposed indicative levels of $30,000 for developing countries and $7,000 for least developed countries as endorsed by the Governing Council of APCTT. This enhanced contribution will enable more effective programme delivery;

(b) Mobilizing technical cooperation project resources. Enhanced extrabudgetary funding support is needed to implement the programme of work recommended by the APCTT Technical Committee and endorsed by its Governing Council. While the Government of India has provided funding for NIS and renewable energy technology cooperation mechanism projects, other member countries are requested to consider providing
funding through suitable modalities. Advice is sought from the Commission on non-traditional sources of funding that may be approached;

(c) Assignment and secondment of national experts and senior personnel. APCTT is seeking the placement of NRL experts in the areas of: (i) innovation and research and development management; (ii) environmentally sound/green/clean technologies; (iii) renewable energy technologies; (iv) commercializing grass-roots innovation and rural development; and (v) technology transfer and intellectual property rights. Requests to member countries through the Centre’s focal points for such assignments have not met with success. Guidance is sought from the Commission on approaches that may be taken to secure such assignments/secondments.
Annex I

Contributions in 2010

**Global fund for institutional support - APCTT/JCE (I004)**

<table>
<thead>
<tr>
<th>Country/area</th>
<th>2009</th>
<th>2010</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bangladesh</td>
<td>5 000.00</td>
<td>-</td>
</tr>
<tr>
<td>China</td>
<td>20 000.00</td>
<td>20 000.00</td>
</tr>
<tr>
<td>Indonesia</td>
<td>35 000.00</td>
<td>10 000.00</td>
</tr>
<tr>
<td>Iran (Islamic Republic of)</td>
<td>6 000.00</td>
<td>14 224.68</td>
</tr>
<tr>
<td>Macao, China</td>
<td>5 000.00</td>
<td>5 000.00</td>
</tr>
<tr>
<td>Malaysia</td>
<td>14 985.00</td>
<td>15 000.00</td>
</tr>
<tr>
<td>Pakistan</td>
<td>7 490.00</td>
<td>7 500.00</td>
</tr>
<tr>
<td>Papua New Guinea</td>
<td>20 000.00</td>
<td>-</td>
</tr>
<tr>
<td>Philippines</td>
<td>-</td>
<td>10 355.77</td>
</tr>
<tr>
<td>Republic of Korea</td>
<td>10 000.00</td>
<td>10 000.00</td>
</tr>
<tr>
<td>Sri Lanka</td>
<td>4 975.00</td>
<td>5 000.00</td>
</tr>
<tr>
<td>Thailand</td>
<td>15 000.00</td>
<td>15 000.00</td>
</tr>
<tr>
<td>Viet Nam</td>
<td>8 000.00</td>
<td>4 000.00</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>151 450.00</strong></td>
<td><strong>116 080.45</strong></td>
</tr>
</tbody>
</table>

**Global fund for institutional support - APCTT/IND (I006)**

<table>
<thead>
<tr>
<th>Country/area</th>
<th>2009</th>
<th>2010</th>
</tr>
</thead>
<tbody>
<tr>
<td>India</td>
<td>401 287.72</td>
<td>199 614.73</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>401 287.72</strong></td>
<td><strong>199 614.73</strong></td>
</tr>
</tbody>
</table>

**Note:**
## Annex II

**Statement of accounts**

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Institutional Support</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Institutional support - joint contribution</td>
<td>387 416.75</td>
<td>116 080.45</td>
<td>82 173.76</td>
<td>8 845.90</td>
<td>0.00</td>
<td>430 169.34</td>
</tr>
<tr>
<td>Institutional support - Government of India</td>
<td>368 070.79</td>
<td>199 614.73</td>
<td>256 227.81</td>
<td>18 383.06</td>
<td>0.00</td>
<td>329 840.77</td>
</tr>
<tr>
<td><strong>Subtotal</strong></td>
<td>755 487.54</td>
<td>315 695.18</td>
<td>338 401.57</td>
<td>27 228.96</td>
<td>0.00</td>
<td>760 010.11</td>
</tr>
<tr>
<td><strong>TC Projects</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Government of India</td>
<td>0.00</td>
<td>75 000.00</td>
<td>33 263.31</td>
<td>834.62</td>
<td>0.00</td>
<td>42 571.31</td>
</tr>
<tr>
<td>Government of India</td>
<td>0.00</td>
<td>122 775.99</td>
<td>79 210.64</td>
<td>0.00</td>
<td>0.00</td>
<td>43 565.35</td>
</tr>
<tr>
<td>United Nations regular programme of technical cooperation (section 22)</td>
<td>0.00</td>
<td>25 000.00</td>
<td>11 000.00</td>
<td>0.00</td>
<td>0.00</td>
<td>14 000.00</td>
</tr>
<tr>
<td><strong>Subtotal</strong></td>
<td>0.00</td>
<td>222 775.99</td>
<td>123 473.95</td>
<td>834.62</td>
<td>0.00</td>
<td>100 136.66</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>755 487.54</td>
<td>538 471.17</td>
<td>461 875.52</td>
<td>28 063.58</td>
<td>0.00</td>
<td>860 146.77</td>
</tr>
</tbody>
</table>
## Commitments – APCTT
(As of 31 December 2010)
(In United States dollars)

<table>
<thead>
<tr>
<th>Donor</th>
<th>Cash balance as of 31 December 2010</th>
<th>Commitments 2011</th>
<th>Purpose</th>
<th>Balance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Institutional support -</td>
<td>329 840.77</td>
<td>214 500.00</td>
<td>GS staff salary (covering 1 G-2, 1 G-4, 3 G-5, 4 G-6)</td>
<td>115 340.77</td>
</tr>
<tr>
<td>Government of India</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>329 840.77</strong></td>
<td><strong>214 500.00</strong></td>
<td></td>
<td><strong>115 340.77</strong></td>
</tr>
</tbody>
</table>
Annex III

Report of the Governing Council on its sixth session

I. Summary of deliberations

1. The Council had before it three documents: (a) report on the activities of the Centre during the period from December 2009 to November 2010; (b) report on the status of financial resources for 2010; and (c) report of the Technical Committee on its sixth meeting.

2. The Council noted the activities and accomplishments of APCTT in 2010. It endorsed the activities planned for 2011 as described in paragraph 82 of the report of the Technical Committee on its sixth meeting.

3. The Council noted that while the mandate of APCTT was relevant in today’s global business setting, it was important for ESCAP to work with APCTT to reinvent itself in the context of securing financial resources to expand its work programme to meet the needs of member countries. It was pointed out that efforts need to be made to mobilize resources from non-traditional sources and that ESCAP should support the Centre in doing this through appropriate interventions.

4. The Council noted the administrative and financial status of APCTT, in particular its financial and human resources. It discussed the possibility of member States augmenting their contributions and modalities to ensure that payments were remitted on a regular basis. The Council made the following suggestions and recommendations.

(a) Enhancement of institutional support:

(i) Seeking to strengthen the financial base in view of rising operational costs, the Council encouraged member States to augment their contributions to APCTT in line with the proposed indicative levels of $30,000 for developing countries and $7,000 for least developed countries;

(ii) Discussion of potential funding support from non-traditional sources, such as industry associations, foundations and trusts, led to suggestions that ESCAP could guide APCTT in exploring such alternatives and that the matter be referred to the Commission to obtain guidance on possible approaches that the Centre could take to mobilize financial resources from non-traditional sources;

(b) Technical cooperation project resources:

(i) APCTT should work closely with focal points to implement programmes recommended by the Technical Committee and explore cost-sharing possibilities in programme implementation;

(ii) The Council suggested that the Centre should consider organizing at least one activity each year that caters to the needs of least developed countries, landlocked developing
countries and small island developing States (countries with special needs);

(iii) One delegation urged APCTT to incorporate standardization and quality assurance as an important component in its programme of work of NIS so that this could serve as a starting point in making this important area a major activity in the future;

(iv) It was proposed that, in early 2011, APCTT could send member States a list of planned activities for the year so that possible collaboration and cost-sharing possibilities could be ascertained;

(v) In response to a query about procedures for finalizing trust fund agreements regarding ESCAP technical cooperation projects, it was pointed out that ESCAP had been delegated the authority to sign agreements that followed the standard United Nations trust fund agreement model. Agreements that differed from the model were subject to approval by the United Nations Controller. However, one delegation pointed out that the current format of the agreement had led to processing delays in securing project funding. The delegation urged that the matter be looked into and stated that a format could be developed in which the agreement would become part of the project document. It was suggested that the matter could be taken up by member countries at the Commission session;

(vi) One delegation suggested that the feasibility of allocating a percentage of project funding towards meeting part of the Centre’s institutional costs might be explored;

(c) Joint activities:

(i) The representative of China indicated that his Government would be willing to work with APCTT in exploring the possibilities for implementing the recommendation made by the Technical Committee to revitalize and strengthen the Asia-Pacific Traditional Medicine and Herbal Technology Network (APTMNET);

(ii) Several delegations strongly endorsed the recommendation made by the Technical Committee that APCTT should initiate a project to promote the commercialization of grass-roots innovation for fostering social entrepreneurship. They stressed the importance of such an initiative in the context of inclusive development and urged APCTT to work with other entities that had commenced similar work;

(d) Assignment of national experts:

(i) Member countries should consider providing the services of experts on a NRL basis to enhance professional capability;

(ii) Focal points could take advantage of the ESCAP internship programme to send postgraduate students to undertake internships at APCTT.
5. The Council endorsed the report of the Technical Committee on its sixth meeting.

A. Report on the activities of APCTT from December 2009 to November 2010 and presentation of the programme of work for the biennium 2010-2011 (Agenda item 4)

6. In introducing the report on APCTT activities, the Head of APCTT indicated that the report on APCTT financial resources for 2010 provided a general overview of the main programme initiatives, including specific activities during the year, and of personnel and financial resources.

7. He expressed the hope that APCTT would, with the Council’s support and guidance, be able to implement its programme of work for helping member countries promote inclusive development and accelerate economic progress through the effective management of technology transfer and innovation.

8. The report on APCTT activities from December 2009 to November 2010 gave an overview of the year’s specific activities. Activities had been directed towards technology capacity-building, promotion and management of innovation, and subregional and regional networking, to help countries of the region respond to the challenges posed by the new global economy and to promote inclusive development.

9. As part of its endeavour towards technology capacity-building, APCTT, he said, continued to strengthen its well-established and regionally accepted ICT-based networks, such as the www.technology4sme.net and www.business-asia.net, that enabled use and sharing of knowledge relevant to technology transfer. Those networks and partnerships had enabled APCTT to expand the geographical coverage of its activities in the Asian and Pacific region. Those websites continued to provide effective and user-friendly delivery of technology transfer services, and were important in facilitating national and international technology transfers and in promoting new and emerging technologies among member countries.

10. He informed the Council that APTITUDE, the APCTT-designed search engine which supported the www.technology4sme.net website, had been substantially upgraded and had now been programmed to search a total of 15 specific technology databases in the Asia-Pacific region, up from five when it had been developed in 2008; more would be added in 2011 and beyond to make it a versatile “one-stop” tool for both buyers and sellers of technology.

11. He then briefed the Council about the Asia-Pacific Traditional Medicine and Herbal Technology Network (APTMNET). The Network, which linked 14 countries in the region, had been established by APCTT in close cooperation with the Hubei Provincial Science and Technology Department in Wuhan, China, with the objective of serving as an information exchange centre for traditional medical and herbal medicinal technology and the development of herbal medicines in the Asia-Pacific region. However, it had been observed that the nodal stations in the member countries were at various stages of development, making it difficult to operationalize the Network. A project profile to revitalize the network was being prepared for the approval of ESCAP. He added that, as an interim
activity, APCTT had provided support to the Iranian Research Organization for Science and Technology (IROST) and the Indian Ocean Rim Association for Regional Cooperation (IOR-ARC) Regional Centre for Science and Technology Transfer (RCSTT) in organizing the Regional Experts Meeting on Herbal Medicine Processing Including Extraction, Standardization, Processing, Formulation, Packaging and Commercialization, which had been held in Tehran on 19 and 20 June 2010. He also informed the Council that the Centre was taking steps to revitalize the Biotechnology Information Network for Asia (BINASIA) by incorporating new developments with the active participation of member countries.

12. The Head of APCTT stated that, in July 2010, APCTT had been granted $250,000, for the period July 2010 to June 2012, by the Ministry of New and Renewable Energy of India to implement a follow-up project entitled “Establishing an institutional cooperation mechanism to promote renewable energy”. That new project had been set up with the aim of consolidating the programme of work that had commenced in 2009 in accordance with Commission resolution 64/3 of 30 April 2008 on promoting renewables for energy security and sustainable development in Asia and the Pacific. The initial activity of the project had involved the gathering of experts from participating member countries and key resource persons for a consultative meeting, held in partnership with the Asian Institute of Technology (AIT), in Pathumthani, Thailand, on 7 and 8 October 2010. The areas of discussion at the meeting included the following: specific activities that could be undertaken by the Centre’s institutional cooperation mechanism to add value to other regional and global renewable energy technology networks; identification of focal points working in the field of renewable energy, in member countries, that could become partners of the regional network; and improvements to the website of the Renewable Energy Cooperation-Network for Asia and the Pacific (RECAP) that would make it a more effective knowledge resource for member countries. He added that APCTT had held, in cooperation with the Nanjing International Technology Transfer Centre (NITTC), a renewable energy business-to-business (B2B) forum in Nanjing, China, on 14 November 2010, which had been aimed at facilitating discussions among renewable energy technology stakeholders in member countries, such as business firms, research and development institutions and technology-transfer intermediaries, on options for strengthening cooperation in technology transfer, business partnerships and collaborative research and development.

13. He informed the Council that the second phase (2010–2013) of the Centre’s project to promote NIS had been initiated in July 2010, with total funding support of $321,750 from the Department of Scientific and Industrial Research of the Government of India. The second phase would go beyond awareness creation and sharing best practices, and would focus on key components, implementation strategies, and management practices of national innovation systems and their organic linkages with subnational and sectoral innovation systems. A key feature of the second phase would entail the involvement of several countries with special needs, including Afghanistan, Bangladesh, Bhutan, Cambodia, the Lao People’s Democratic Republic, Myanmar and Nepal. He stated that, under that programme of work, a consultative workshop on Promotion of National Innovation Systems in Countries with Special Needs had been held for senior policymakers on 19 and 20 October 2010, in partnership with the Ministry of Science and Technology of Thailand. He also stated that the Centre had organized the Asia-Pacific Forum on Strengthening the Governance of
National Innovation Systems held in Jakarta on 24 and 25 November 2010 in partnership with the Indonesian Institute of Sciences. The last activity in 2010 under this programme of work, he said, would be a national workshop on linkages and partnerships among enterprises, research and development institutions and academia/universities to foster innovation and transfer of technology that was to be held in Hanoi on 22 and 23 December 2010 in partnership with the Viet Nam Center for Technology Information Exchange, National Agency for Science and Technology Information (NASATI).

14. The Council was informed that APCTT, through its networks of technology transfer intermediaries, and its technology-transfer portals, had received 255 offers to provide technologies and 192 requests for technologies from SMEs across the Asia-Pacific region during the period September 2009 to September 2010. He added that APCTT facilitated technology-transfer initiatives by working with China, the Islamic Republic of Iran and Thailand in promoting: the participation of member countries in Iran Biotech 2010, which had been held in Tehran from 13 to 15 April 2010; the programme on Buildings Integrated with Solar Energy Technology Systems: Research and Applications organized by the Yunnan Academy of Scientific and Technical Information (YASTI), China and held from 19 to 21 April 2010; and the Workshop to Promote Commercialization of Technology in the Areas of Jatropha Oil and Wood Pellet Machines and Tools, organized by the Ministry of Science and Technology of Thailand and the Thai Machinery Association, which had been held in Bangkok from 28 to 30 April 2010 and had included field trips to the Chai Nat, Lampang and Chiang Mai provinces of Thailand to study demonstration projects. In all of those events, the local costs incurred by member country participants had been covered by the host organizations.

15. The Head of APCTT stated that APCTT publications continued to be essential in the dissemination and promotion of technology information and utilization. Such products as the periodical *Asia–Pacific Tech Monitor* or the information resources of *Value Added Technology Information Services* (VATIS) in the areas of ozone layer protection, waste technology, biotechnology, food processing, and non-conventional energy were being disseminated widely. Such products had become entirely web-based and could be downloaded free of charge following suggestions from the Governing Council. This had also resulted in costs savings for the Centre.

16. He explained how APCTT activities strengthened cooperation with least developed countries, landlocked developing countries and small island developing States.

17. He elaborated on the normative and analytical work of APCTT and its partnering and cooperation initiatives with leading national and United Nations agencies.

18. He outlined the work programme recommended by the Technical Committee at its sixth meeting, which had included:

(a) Promotion of NIS in countries of the Asia-Pacific region (funding received, work commenced);

(b) Strengthening innovation in research and development institutes in the Asia-Pacific region (funding to be obtained);
(c) Building technology-transfer capacity in the Asia-Pacific region (work commenced);

(d) Assisting SMEs in the application of new and emerging technologies, including environmentally sound technologies (work commenced);

(e) Improving the skills of policymakers and entrepreneurs by promoting grass-roots innovations and traditional knowledge-based technologies in selected areas for inclusive development and social entrepreneurship (funding to be obtained);

(f) Establishing an institutional cooperation mechanism to promote renewable energy (funding received, work commenced);

(g) Making information on global technological policies, markets, innovations and events available to policymakers and decision makers.

19. He then reported to the Council on (a) the administrative and financial status of APCTT, in particular its financial and human resources, (b) funds received by APCTT and (c) its expenditures during the reporting period. He informed the Council of the difficulties that APCTT faced owing to increased local operating costs and that contributions from member States had not kept pace with increasing costs. In that regard, he reminded the Council of its recommendation in 2009 that contributions for institutional support be made at the levels of $30,000 for developing countries and $7,000 for least developed countries.

20. He informed the Council that APCTT lacked sufficient staff at the professional level. With no financial provision under the current institutional set-up for medium-term employment of professional staff, the staff shortage was covered through the assignment of experienced professionals on a NRL basis to APCTT for periods of two or three years. He urged member countries to assign such experts and senior personnel to work at APCTT in relevant areas.

21. Following his presentation, the participants made several suggestions that are summarized in paragraph 4.

B. Report on the sixth meeting of the Technical Committee
(Agenda item 5)

22. The Council had before it the report of the Technical Committee on its sixth meeting (TID/APCTT/GC(6)/5).

23. The Council noted with interest the proposals of the Technical Committee to strengthen technology transfer and innovation management activities through the proposed programme of work. The Council also noted with interest the new areas of activities proposed by the Committee that could serve to consolidate ongoing initiatives.

24. The Council endorsed the report of the Technical Committee on its sixth meeting.
C. Proposed future projects and programme of work for the biennium 2010-2011
(Agenda item 6)

25. The Council noted the recommendations of the Technical Committee for future projects and activities of APCTT and advised APCTT to develop the proposed project concepts in collaboration with the concerned member countries and seek financial resources for their implementation.

26. Suggestions for future activities and new projects consisted of the following:

(a) National Innovation System Phase 2 - Promotion of national innovation systems in countries of the Asia-Pacific region (funding received, work commenced):

(i) Build capacity at the national level to enable policymakers to understand the importance, key components and implementation strategy and management practices of NIS and its organic-linkages with subnational and sectoral innovation systems with attention focused on areas such as: best management practices of technology incubation centres; networking of research and development institutions for technology development and transfer of technology; management of intellectual property rights; and technology-led women entrepreneurship development (funding available);

(ii) Provide advisory support, through experience-sharing and regional workshops, on the strengthening of subnational innovation systems in sectors such as biotechnology, advanced materials, and nanotechnology, with attention to specific and well-defined areas within those sectors based on national priorities (funding available);

(iii) Continue to disseminate information on NIS for promoting high and emerging technologies through the NIS Resource Centre on the APCTT website (funding available);

(iv) Promote best practices in the establishment and operation of technology business incubators and technology parks (funding available);\(^a\)

(v) Document best practices in member countries for promoting cooperation between industry, academia and research and development institutions (funding available);

(vi) Partner with the Science and Technology Policy Institute (STEP) to conduct field surveys and brainstorming seminars in countries with special needs that would be willing to engage in this NIS-building exercise with a view towards facilitating their NIS direction and formulating science, technology and innovation (STI) policy and strategies (funding to be obtained);

\(^a\) The representative of Indonesia stated that that initiative would be jointly conducted with APCTT in Indonesia in 2011. The representative of Pakistan expressed an interest in participating in an initiative of that nature.
(vii) Strengthen the innovation capacity of organizations in technology parks to enhance the commercialization of research results (funding to be obtained);

(b) Establishing an institutional cooperation mechanism to promote renewable energy (funding received, work commenced):

(i) Increase the understanding of target stakeholders of various cooperative mechanisms that are available with regard to promoting renewable energy resources and raise their awareness of the need to establish a regional cooperative mechanism that adds value to those already in existence (funding available);

(ii) Enhance the knowledge of target stakeholders on best practices related to the development, promotion and transfer of renewable energy technology resources in planning and implementing renewable energy technology projects (funding available);

(iii) Enhance the website of RECAP to make it a regional information hub for information sharing, networking and collaborative activities (funding available);

(c) Strengthening innovation in research and development institutes in the Asia-Pacific region (funding being sought):

(i) Create a regional web-based research and development resource facility that contains information on nodal research and development institutions, a database of prominent researchers in member countries, and details of research projects for which collaboration is being sought (in a focused area, such as nanotechnology);

(ii) Conduct training programmes, in association with knowledge partners and leading research and development institutions in the region, to introduce best practices in critical areas, such as research and development proposal preparation, research and development project selection, research and development project monitoring, enhancing of creativity of research and development in human resources, research and development management information systems, intellectual property protection, commercialization of research results, and planning and implementing joint international research projects. Training programmes should be geared to the stage of technological development of participating countries;

(d) Building technology-transfer capacity in the Asia-Pacific region (partial funding available):

(i) Develop a comprehensive training manual that covers all stages of the life cycle of international technology transfer projects (funding available);

(ii) Develop a website for technology-transfer support that contains the training manual and other relevant materials, and
link it with the www.technology4sme.net and www.business-asia.net websites (funding available);

(iii) Develop a version of the technology transfer-training manual for inclusion in the Comprehensive Guidebook for SME Development that is being compiled by the Trade and Investment Division of ESCAP (funding available);

(iv) Conduct training of trainers programmes to develop national capacity for advisory and consultancy support to SMEs at all stages in the life cycle of the technology transfer project and provide support to member countries to enable the trained trainers to organize national training programmes for developing a critical mass of expertise (funding to be obtained);

(v) Help interested member countries organize activities aimed at enhancing standardization and quality assurance at SMEs by facilitating cooperation with global and regional metrology organizations, such as the International Bureau of Weights and Measures (BIPM), the International Organization of Legal Metrology (OIML), and the Asia-Pacific Metrology Programme (APMP) (funding to be obtained);

(vi) Facilitate capacity-building for firms in selected sectors in engineering (funding to be obtained);

(vii) Develop the skills and build the capacities of research and development institutes, science and technology service institutes and SMEs in evaluating technologies at the different stages of commercialization, paying attention to different approaches that could be adopted to deal with technologies that might have social implications or could be commercially viable (funding to be obtained);

(viii) Assist Bangladesh in setting up a National Technology Transfer Centre (funding to be obtained);

(ix) Provide SMEs with training on the use of online technology-transfer market places (funding to be obtained);

(e) Assist SMEs in applying new and emerging technologies, including environmentally sound technologies:

(i) Promote venture entrepreneurship by establishing/updating the Business-Asia portal (funding available);

(ii) Develop web-based technology-transfer services and web-based technology-transfer networks by streamlining and expanding the www.technology4sme.net website and the APTITUDE search engine (funding available);

(iii) Provide proactive services to buyers and sellers of technology and enhance the technology-transfer database on the www.technology4sme.net website (funding available);
(iv) Publish a guidebook on the effective management of technology transfer with an emphasis on clean and renewable energy technologies for enhancing the competitiveness of SMEs, taking into account gender dimensions (funding available);

(v) Expand and promote the Biotechnology Information Network for Asia and its portal (funding to be obtained);

(f) Expanding the Asia-Pacific Traditional Medicine and Herbal Technology Network (funding being sought):

(i) Strengthen APTMNET to promote effective dissemination of information to encourage industrial/technical cooperation on traditional medicine in Asia and the Pacific; and to help member countries that have not yet established nodal stations or developed one to agreed levels in network architecture, website design, structure of the database, technical standards of the nodal stations, and the role and responsibilities of the project coordinator in the nodal station;

(ii) Act as a facilitator, in partnership with organizations, such as the Indian Ocean Rim Association for Regional Cooperation (IOR-ARC) Regional Centre for Science and Technology Transfer (RCSTT), to promote visits by traditional medicine companies from member countries to selected countries, such as China, India, the Islamic Republic of Iran, Malaysia, Pakistan and Sri Lanka, to study best practices and explore business partnerships;

(g) Commercializing grass-roots innovations (GRI) for fostering social entrepreneurship (funding being sought):

(i) Extend support to interested countries, other than the four countries covered during the completed GRI project, for the building of scouting, documenting and dissemination skills;

(ii) Help member countries develop institutional mechanisms for value adding and nurturing entrepreneurship, including access to markets through the sharing of experiences and the benchmarking of best practices;

(h) Making information on global technological polices, markets, innovations and events accessible to policymakers and decision makers (ongoing activities): Collect information on technologies, including incentives, regulations and markets, and disseminate it through various channels, such as websites, workshops, seminars and APCTT periodicals. In addition, disseminate the latest information through the Asia-Pacific Tech Monitor, the Value Added Technology Information Services Update series and other publications/periodicals using the Internet media.

27. The Council endorsed the work programme proposed for 2011.
D. Date and venue of the seventh meeting of the Technical Committee and the seventh session of the Governing Council (Agenda item 7)

28. China offered to host the seventh meeting of the Technical Committee during the last week of November 2011. In line with the ESCAP recommendation, the Council recommended that the seventh session of the Governing Council of APCTT be held in Bangkok in mid-December 2011.

E. Other matters (Agenda item 8)

29. The Council noted with appreciation the programme and institutional support provided to APCTT by the Government of India.

30. The Council expressed its appreciation of the guidance and valuable backstopping support provided to APCTT by the secretariat of ESCAP.

F. Adoption of the report (Agenda item 9)


II. Organization of the session

A. Opening of the session (Agenda item 1)

32. The sixth session of the Governing Council of APCTT was held in Bangkok on 13 December 2010. The meeting was called to order by the Chief of the Information and Communications Technology and Disaster Risk Reduction Division in lieu of the Chief of the Trade and Investment Division of ESCAP, who could not be present. He also delivered the opening statement of the Chief of Trade and Investment Division.

33. The Chief of the Trade and Investment Division observed that technology had contributed significantly to higher productivity and economic growth. He pointed out that, for a country to achieve sustainable social and economic development, it must have the capacity to manage its technological development. Consequently, the region’s future growth depended on access to and the adoption of new and emerging technologies.

34. He noted that the programme of work of APCTT for the biennium 2010-2011 fell under the ESCAP subprogramme on trade and investment, which was aimed at strengthening regional cooperation and integration in trade, investment, finance, and technology transfer in the Asia-Pacific region in support of inclusive and sustainable development. He pointed out that, following the change in the conference structure instituted in January 2010, the Centre was now being backstopped by the Trade and Investment Division, replacing the Information and Communications Technology and Disaster Risk Reduction Division.

35. He added that the activities of APCTT had been directed towards technology capacity-building and innovation as well as subregional and regional networking to support the countries of the region in the current scenario of free trade, globalization and intense international competition.
He pointed out that APCTT had assisted its member countries in upgrading the technology-transfer capacities of their SMEs and technology-transfer intermediaries by providing substantive advisory and support services. In addition, member countries received assistance in refining their national innovation systems and promoting renewable energy through the utilization of innovative activities and the development of institutional cooperation mechanisms at both the organizational and grass-roots levels.

36. The Chief of the Trade and Investment Division elaborated upon the seven areas of work that the APCTT Technical Committee had recommended at its sixth meeting, which had been held in Jakarta on 22 and 23 November 2010.

37. He expressed the hope that the deliberations of the Governing Council would provide valuable guidance to APCTT in framing its programmes and policies and regional cooperation measures, in particular for the least developed countries, landlocked developing countries and small island developing States, as well as the economies in transition.

38. He added that, while APCTT continued to receive support from various sources to implement its work programme, greater efforts were needed to strengthen the institutional framework, increase its financial base and strengthen the personnel infrastructure of the Centre. He assured the Governing Council that ESCAP remained fully committed to support APCTT in that context. He urged the Council to provide guidance on measures to ensure the sustainability of APCTT to enable it to conduct its work programme effectively. He expressed deep appreciation to the Government of India for hosting and financially supporting APCTT and to all the members, whose constant support and cooperation had been most encouraging for the activities of APCTT.

B. Attendance

39. The session was attended by the following member countries of the Governing Council: Bangladesh; China; Fiji; India; Indonesia; Malaysia; Pakistan; Sri Lanka; Thailand; and Viet Nam.

C. Election of officers
   (Agenda item 2)

40. The Council unanimously elected H.E. Mr. J. B. Disanayaka of Sri Lanka Chair and Mr. Chen Linhao of China Vice-Chair.

D. Adoption of the agenda
   (Agenda item 3)

41. The Council adopted the following agenda:

1. Opening of the session.
2. Election of officers.
3. Adoption of the agenda.
5. Report on the sixth meeting of the Technical Committee.


7. Date and venue of the seventh session of the Governing Council.

8. Other matters.

9. Adoption of the report.