APPENDIX 5

Strategic Framework on Measurement of APEC TiVA under GVCs

I. Background

Whereas, the emergence of global value chains (GVCs) provided a catalyst for accelerated change in the landscape of international investment and trade, with major, far-reaching consequences on governments as well as enterprises. Today, economic globalization has entered into an era of GVCs, trade and investment in APEC and production networks in Asia-Pacific have become an important part of the GVCs. The principles of GVCs can establish framework for formation of holistic approach among APEC economies and public and private interests, thus to pragmatically advance realization of APEC goals and targets via Asia Pacific Partnership for APEC economies.

Taking notice of International organizations including WTO, UNCTAD and OECD, APEC economies such as US, Japan and China and institutions such as World Economic Forum, Department of Economics of U.S. International Trade Commission, Centre for Strategic and International Studies, Institute of Developing Economies (IDE-JETRO), and Chinese Academy of Sciences, that all have positively carried on study on the GVCs and trade in value-added (TiVA).

Observation via GVCs and TiVA would reveal economic performances and implications for economies in GVCs, as well as increasing visibilities on socioeconomic coefficients and correlations, and benefits and challenges on new policy changes. Therefore, studies of GVCs and TiVA can contribute significantly to promotion of trade and investment facilitation, mitigation of systematic risk, extension of APEC regional production networks, advancement of supply chain connectivity, enhancement of APEC's leadership role in manufacturing and sustainment of APEC economic growth.

Based on the situation of trade in goods and services with fragmentation and outsourcings, GVCs and TiVA would reveal many aspects of policy and strategic implications for decision makers of public and private sectors of APEC economies.

Current progress on GVCs, TiVA and Input-Output (IO) Tables is observable. During recent years, Chen Xk and Yang Ch et al (2007), Hummels D. et al. (2001), R Koopman and Wang Z. et al. (2011), undertook case studies and sector level research to explore the methodologies to measure TiVA. OECD/WTO, UNCTAD EORA, and GTAP databases have generated a sound basis of analytical framework to study and visualize the GVCs. Hereby, it is proposed for APEC to facilitate the measurement of TiVA for APEC economies, to support improvements of policy making, to enable enterprises and other public stakeholders to benefit from GVCs resource and applications, and to adapt innovative approaches for continuous advancement and expansion of GVCs methodologies and applications. The measurement of TiVA among APEC economies would be based on and linked to the internationally recognised WTO/OECD TiVA database.

II. Objectives

Centering on promoting APEC cooperation on global value chains, with the aim to promote global value chains while recognizing the ideas of interdependency and benefits-sharing, with the support of the multilateral WTO/OECD TiVA initiative, the measurement of TiVA in APEC will consider the concerns and needs of all the economies and their stakeholders, recognize the various development levels so as to realize the following objectives:

- 1. Measure TiVA and its policy implications for trade, investment, employment, emission and SMEs etc.
- 2. Facilitate future implementation of APEC Recommendations on Promoting GVCs Development and Cooperation, particularly in terms of promoting trade in intermediate goods, facilitating cross-border investment, increasing proportion of services in production, advancing supply chain connectivity etc.
- 3. Enhance understanding on Knowledge-based Capital in GVCs and innovations related to GVCs among APEC economies.
- 4. Enable industries and enterprises to participate and benefit from GVCs through gaining better visibility, improving decision making and optimizing performance.
- 5. Integrate "big data" applications, "real-time" data collected from public operators and private sectors via Public Private Partnership (PPP) with GVCs and TiVA studies, to increase data visibility and to form dynamical and leading indicators, for scientific, precise and timely policy and decision making.
- 6. Promote trade and investment liberalization and facilitation, consolidate the growth of APEC economies, and achieve mutually beneficial outcomes regarding GVCs among APEC economies.

III. Actions

The key work is to disentangle domestic and foreign value-added in goods and services among APEC economies. This requires a full set of inter-economy IO tables, where all bilateral exchanges of intermediate goods and services are accounted for. Recognizing the development of regional value chains in North American and European economies the measurement of TiVA in the APEC economies would provide more meaningful measures of the importance of trade and investment and allow for further economic integration and better understanding of the APEC economies development in the context of broader global value chains.

- 1. Help APEC economies improve domestic national accounts statistics and services trade statistics for multiple economies. Gather information on economies' agencies directly in charge of the generation of the data required.
- 2. Incorporate improved value-chain data with PPP "big data".
- 3. Supply such data to the WTO/OECD TiVA database.

- 4. Compile statistics on macro data and foreign trade of APEC economies, and clarify categories in macro-economic, national income accounts of APEC economies so as to realize effective connection necessary for accurate measurement of TiVA.
- 5. Strengthen capacity building, and prepare or update APEC economy IO tables to ensure effective connection.
- 6. Work on statistics and accounting in value added through the value-added approach under the GVCs, and clarify economic interests of APEC economies, inclusive job, innovation, development, structure reforms, as well as their industrial competitiveness and the route for upgrading.
- 7. Integrate statistics of the domestic economy, foreign trade and TiVA of APEC economies.
- 8. Explore in the CTI how APEC can undertake policy research, information exchange; approach on statistics collection; capacity building and training; strengthen the technical training for SMEs in APEC to integrate into APEC value chains, including looking for competition points of the value chains and factors to strengthen the international competitiveness of the value chains.
- 9. Host yearly dialogues on TiVA to bring together GVC experts in APEC economies and support the implementation of the above actions.

IV. Schedule

In 2014, MRT endorse Strategic Framework on Measurement of APEC TiVA under GVCs, and start implementation afterwards.

In 2015-2017, CTI make statistical and technical preparation on scope of statistics collection and unification of standards, capacity building and training for compiling APEC IO tables.

In 2017-2018, CTI coordinate with WTO/OECD TiVA database and IO tables, and compile or tabulate APEC IO tables.