## Freely available Research and Development (R&D)

Mr. Aspden reported that during a joint meeting of NESTI with the Canberra II Group in May. One of the questions was how to interpret the AEG's recommendation not to capitalize freely available R&D and in principle assume that including freely available R&D in GFCF would not lead to a significant error because freely available R&D was minor. To address this question, Mr. Aspden prepared a note proposing conceptual precision on what should be excluded when recognizing capital formation in R&D and presented some guidelines on how to deal with this issue in practice after further efforts to quantify the amount of freely available R&D. He found that basic research undertaken by higher education institutions, government and non-profit institutions were strong candidates for exclusion from GFCF, since it would seem likely that for most of this research there was no strategy in place to capture future economic benefits. He said that these expenses represent around 20 percent of the expenditure on R&D on average by the countries for which he had data. By contrast, it could be assumed that business enterprises expect to gain benefits from their basic research. Further discussions are needed on research undertaken by non-profit institutions.

The ISWGNA expressed support for the conceptual clarification and agreed the following:

Research and development should be treated as capital formation and the value should be determined in terms of the economic benefits it provides. In principle, R&D that does not provide an economic benefit to its owner does not constitute a fixed asset and should be treated as intermediate consumption. Because it is difficult to quantify the benefits of R&D, by convention, it may be valued at the sum of costs.

The ISWGNA suggested approaching countries that did not support the idea of recording freely available R&D as GFCF next week to discuss this issue. The meeting also suggested including the ISWGNA's proposal in the package to be sent to the AEG.