

FIDIC-EFCA Consulting Engineering Industry Survey

Status Report

Monday, December 30, 2013

Text with links available at <http://survey.peterboswell.net/blog/2013/status-report.aspx>

Introduction

The FIDIC-EFCA Consulting Engineering Industry Survey published in 2013 (see [PDF](#)) showed that:

- a) the demand in 2009 for consulting engineering services in the European Union (EU) 27 Member States (EU27) was 12% of the investment (measured in terms of GFCF, Gross Fixed Capital Formation) requiring the services;
- b) this estimate of domestic demand agreed with the actual domestic use obtained from the new System of National Accounts (SNA09) Supply-Use Tables (SUTs), a complete set of which were available for the first time for 2009.

The results confirmed that estimating demand from investment could be used for the many countries that do not report data for consulting engineering in national accounts.

While year-to-year trends can be determined by assuming that the percentage of investment requiring services remains unchanged, it is clearly more reliable to obtain the domestic use for consulting engineering services directly from SUTs.

This note reports on the availability of SUTs and the implications for the FIDIC-EFCA survey. At the same time a small adjustment is made to the 2009 data now that more accurate estimates are available for investment in research and development and in weapon systems, these being two new types of assets requiring consulting engineering services that are included in SNA08.

SUTs for EU Member States

A revised European System of National and Regional Accounts (ESA2010) for EU Member States comes into force in September 2014. Broadly consistent with the international SNA published in 2008 (SNA08), ESA2010 requires greater precision in definitions, classifications and accounting to handle specific EU requirements and to ensure harmonised reports from all EU Member States.

With regard to investment requiring consulting engineering services, the move from the former (1995) version of ESA to ESA2010 includes the recognition of R&D as capital formation (so R&D will be included within GFCF, rather than as intermediate consumption). Second, expenditure on weapons systems that meets the general definition of assets is classified as capital formation (so eligible expenditure on weapons systems will also be included within GFCF, rather than as government final consumption expenditure).

The compilation of SUTs is one of the essential requirements in the implementation of SNA08 and ESA2010. The change to ESA2010 has meant that the last full set of SUTs used in the FIDIC-EFCA survey to determine the actual use of consulting engineering services for Europe were for 2009. Eurostat has indicated that SUTs for the EU in 2010 and 2011 will be published in 2015 and given that Member States have three years to report SUTs under ESA2010, the SUTs for 2012 will be published in 2016. Consequently, it will be impossible to update the use data for Europe before 2016. Until then, the FIDIC-EFCA survey will use investment data to determine demand.

Status of SUTs worldwide

SNA recommends the compilation of SUTs as a first step in the preparation of national accounts. In addition, the World Bank's International Comparison Program which determines purchasing power parities for products and services across 158 countries (the 2013 results are due shortly) recognizes that SUTs provide an effective framework for providing consistent estimates of essential but basic macroeconomic statistics such as Gross Domestic Product.

However, a 2012 UN report ([PDF](#)) and a 2013 update ([PDF](#)) highlighted the slow implementation worldwide of SNA's, quite apart from the need to change from the 1993 system to the new 2008 SNA. Second, an [OECD survey](#) carried out in 2012 showed that only one-third of developed countries were implementing

SNA08. The Asian Development Bank confirmed this conclusion following a series of [workshops](#). On a more positive note, the African Development Bank reported in 2012 ([PDF](#)) that African countries are at least moving towards the publication of SUTs by increasingly using SUTs to obtain benchmark macroeconomic estimates.

However, overall it is not surprising that SUTs compiled according to SNA08 (that allows consulting engineering services to be identified) are only routinely available for a handful of countries. The main hope today is that the larger developed countries will at least publish provisional SUTs in a timely fashion (see [article](#)) as is done by Australia, Canada and the UK. Final SUTs, if available, are usually published three years after the year in question (e.g., by Eurostat under the ESA2010 [timetable](#)).

R&D and weapon system investments updated

Eurostat and others have recently estimated the impact of the changeover to ESA2010 on national accounts of capitalising R&D and weapon systems. GDP will increase by about 2% with 80% due to both scientific and non-scientific R&D and 20% due to weapon systems, equivalent to a 7.0% and 1.7% of GFCF, respectively.

In a more detailed study, INNODRIVE, an EU programme, [reported](#) in 2012 that scientific R&D in the EU27 had remained approximately constant at 1.05% of GDP from 1998 to 2005. Assuming that it continues to remain constant, scientific R&D GFCF in 2009 was 4.6%.

The FIDIC-EFCA survey assumed that R&D and weapon systems accounted for 4% and 1%, respectively, of GFCF. The demand for consulting engineering services concerns scientific R&D so both estimates should be revised upwards by small amounts to 4.6 and 1.7% to give the GFCF requiring consulting engineering services as bEUR 2933 instead of bEUR 2611 (a 1.2% increase), with the domestic demand increasing from bEUR 351 to bEUR 360 (a 2.6% increase). The percentages for each sector of activity also change slightly as follows:

	Survey	New estimate
Construction	56.3	54.9
Equipment	10.6	10.4
Weapons systems	2.5	2.8
R&D	14.2	15.9
Own-account design	16.4	16.0

These adjustments owing to revised estimates of investments in R&D and weapon systems are within the error limits and do not affect a main conclusion of the survey, namely that the investments measured in national accounts lead to an accurate estimate of the demand for consulting engineering services.

Conclusions

Given the continuing, and largely unanticipated, poor availability of Supply-Use Tables compiled according to the 2008 international System of National Accounts, the FIDIC-EFCA Survey of the Consulting Engineering Industry will only be able to check again in about 2015 that potential demand in the EU calculated from investments corresponds to the actual use obtained directly from the tables. For the rest of the world, it is too early to tell whether a sufficient number of countries will report SNA08 SUTs that allow the worldwide use and supply of consulting engineering services to be determined directly.

The survey should therefore continue to focus on estimating demand from investment while monitoring the status of Supply-Use Tables and using any tables that are published as a crosscheck for specific countries.

Peter Boswell
30 December 2013