Title: ISO/IEC JTC1/SGFS Report to the JTC1 Ad Hoc on Re-engineering about future activities on functional standardization within JTC1

Source: ISO/IEC JTC1/SGFS Plenary Meeting, May 1997, London, UK

Status: For consideration by the JTC1 Ad Hoc on Re-engineering

Current situation

There are strong indications that the activity on functional standardization within JTC1 is entering a new phase:

- the change in membership from P-member to O-member by the USA, Germany and Australia. Two of these countries (USA and Germany) had a leading role within SGFS from the beginning.

- the Regional Workshops, as "feeder-organizations" of SGFS, are changing their directions and it is an open question whether they still require a separate body within JTC1 as a channel to internationally harmonize, approve and publish profiles within ISO/IEC.

- while it seems that the interest in profiling itself outside JTC1 remains high, SGFS has noted that during the past two years the interest in the formal standardization of profiles through ISO/IEC has decreased.

At the same time the JTC1 Ad Hoc on Re-engineering requested SGFS to report on the status and the viability of its work program relative to the re-engineering of JTC1.

Consequently SGFS has considered the future evolution of functional standardization within JTC1 and has come to the preliminary conclusion presented below.

In order to finalize these conclusions, SGFS needs to know what its "customers" require in the near or long term future. SGFS, therefore, is requesting, in doc. SGFS N1421, responses from the Regional Workshops, A-, B-, C- and S-liaisons, the relevant SCs/TCs, and ITU-T on such issues as:

- their continued interests in profiling,

- any current work in progress to be submitted as ISPs,

- their long term interest in standardizing profiles in JTC1, and

- the value to them of the taxonomy principles and documentation guidelines in TR10000.

Responses are requested by the end of August 1997 so that the information is available at the JTC1 Plenary in September 1997 in Ottawa, Canada.

Preliminary conclusions

1. The concept of profiling , see doc. JTC1 N4586 (SGFS N1410)

The concept of a profile (of standards), as the specification of the use together of a number of standards either to address a specific requirement or to support a particular area of IT applications, is widely accepted and is seen as applicable not only to ISO/IEC standards but also to publicly available specifications (PAS). Profiling activity takes place not only in the context of the ISP process through the Regional Workshops, ISO TCs and SGFS, but also in industrial consortia such as The Open Group and POSC, trade associations and other fora.

Thus, profiling is widely seen as necessary and effective in defining commonality of computing environments in order to facilitate application portability, and in specifying requirements on systems to enable interoperability. In particular it seems likely within JTC1 that profiling will have an important place in the work of Business Teams and activity on GII.

2. Role of ISPs

An ISP is a specific type of ISO document that has been created for the purpose of publishing approved International Standardized Profiles. The question raised in this section is whether this publication means will still be useful in the future, and whether the ISP process should be kept or discontinued.

An ISP provides a way of documenting a profile that defines how 'higher' functionality can be achieved by combining functionality from individual base standards (and ISPs). A number of important aspects can be identified as being the added value of an ISP :

- the identification of the base standards plus their selected options that together ensure the functionality of the profile.

- an unique (taxonomy) profile identifier through which the profile can be referenced. This identifier not only eases the construction of a catalogue of profiles, but also allows, assuming that an appropriate methodology to generate the profile identifiers is used, the identification (and the relative position) of the profile within a taxonomy: this may imply architectural choices for the ISP environment.

- a more precise conformance statement - in order to achieve conformance to the 'higher' functionality, simple conformance to each of the individual base standards is usually not enough. This conformance statement does not contradict the one present in base standards, but it may add constraints to a product already conforming to the base standard.

- documentation of testing requirements - when combining various specifications, testing of the complete functionality becomes an issue that cannot be solved by simply testing the individual base standards.

An ISP brings together all the above aspects in a single document, ratified and published by ISO/IEC. The harmonization process, as part of the lightweight process to adopt ISPs through SGFS (similar to the PAS process) is designed to ensure the direct submission of draft ISPs that reflect the market needs (i.e. there is no new work item procedure and development process within SGFS itself).

Despite the value of the document structure that it provides, ISPs themselves have not received the wide recognition and it is not clear whether the concept of ISPs (as a specific kind of standards document) will be useful in the future. In the long term it is up to the JTC1 "customers" to answer this question.

At the same time it should be recognised that the ISP approval process, with the associated concept of S-liaisons, was set up to channel profiles from the Regional Workshops to JTC1 through SGFS. The PAS procedures now provide an equivalent process through which profiles from outside JTC1 can be submitted and organizations wishing to submit profile specifications for standardization can use the PAS-submitters entrance.

3. The next phase in functional standardization within JTC1

The way SGFS has operated as a body within JTC1 to internationally harmonize, approve and publish ISPs has been very successful and efficient (see doc. JTC1 N4586 = SGFS N1410). However, a number of elements suggest that its current role is no longer required:

- the completion of TR10000 - making available a taxonomy and architecture for profiling activities;

- the prospect that the current major programme of ISP development is nearly finished;

- the availability of PAS procedures as a route for the direct submission of profile specifications for standardization;

- the fact that NB support for a separate group on functional standardization is coming to an end.

At the same time it remains true that profiles produced within JTC1 itself can become internationally harmonized standards by using the IS or TR approval procedures.

Thus, it is concluded that steps should be taken to bring the current SGFS activities to an orderly end, and to incorporate functional standardization as a part of normal JTC1 activities. SGFS should then be dissolved unless NBs identify the need for specific new initiatives on profiles and profiling, and the necessary resources are made available.

The steps to be taken are:

- in the short term:

  - process remaining ISPs (already submitted or identified through responses to SGFS N1421) through the existing procedures by the SGFS secretariat and the SGFS chair;

  - finalize TR10000 Part 1, 2 and 3 as a consistent set of documents;

  - establish requirements for a WWW-site presenting JTC1's activities on functional standardization in the long-term;

  - establish, in collaboration with ISP submitters, maintenance mechanisms for published ISPs;

  - identify any responsibilities which should be transferred to other groups (e.g. Regional Workshops).

- in the long term:

  - identify profiling as an integral part of JTC1 activity, to be carried out through the PAS process or through normal SC activities;

  - amend the JTC1 Directives to include guidelines for the standardization of profiles - taking into account the provisions of TR 10000;

  - encourage profile developers to apply to become PAS submitters.

These actions are intended to bring about the closure of current SGFS activities in an orderly fashion, ensuring the transfer of competencies to other JTC1 bodies (e.g. Business Teams, SCs etc.) and marking the beginning of a new era of collaboration with other JTC1/TCs and other bodies as PAS submitters such as - but not limited to - the Regional Workshops. JTC1 Reengineering process is requested to support this process.