ISO/IEC JTC 1 N 9645

ISO/IEC JTC 1
Information Technology

Document Type:	**NWIP**
Document Title:	**NWIP, Software and Systems Engineering – Guide for Process improvement**
Document Source:	**SC 7**
Reference:	**N4352, Resolution 1164**
Document Status:	**This document is circulated to JTC 1 National Bodies for concurrent review. If the JTC 1 Secretariat receives no objections to this proposal by the due date indicated, we will so inform the SC 7 Secretariat**
Action ID:	**ACT**
Due Date:	**2009-10-19**
No. of Pages:	**5**

ISO/IEC JTC1/SC7 N4405

2009-07-19

Document Type	**NWIP**
Title	NWIP, Software and Systems Engineering – Guide for Process improvement
Source	WG10
Project	**31012**
Status	**NWIP**
References	N4352, Resolution 1164
Action ID	ACT
Due Date	2009-10-19
Start Date	2009-07-19
Distribution	SC7 AG
Medium	PDF
No. of Pages	5
Note	Please vote using the ISO Electronic Balloting Facilities (Resolution 937)

New Work Item Proposal

May 2009

PROPOSAL FOR A NEW WORK ITEM

Date of presentation of proposal: 2009-05-29	Proposer: WG10
Secretariat: National Body	**ISO/IEC JTC 1 N** XXXX ISO/IEC JTC 1/SC 7 N XXX

A proposal for a new work item shall be submitted to the secretariat of the ISO/IEC joint technical committee concerned with a copy to the ISO Central Secretariat.

Presentation of the proposal - to be completed by the proposer.

Title Software and Systems Engineering – Guide for Process improvement
Scope This new work item is a component of the revision of ISO/IEC 15504, Information technology – Process assessment. The scope of this work is to develop a guide to lead organizations to successful process improvement as described in the attached study group report.

Purpose and justification – The purpose and justification for this work is contained in section 6.4, 7.1.1 and 8.2 of the report of the Study Group on the revision of ISO/IEC 15504, 07N5352, and is summarised below.
 	
Since the publication of the ISO/IEC 15504 several new models, methods and technologies have been developed to support process improvement in an organization. This NWI will guide an organization on how to ensure benefit from process improvement and how to prepare for success with initiatives and programs linked to specific processes improvement.
 	
It is to often seen that organizations struggles with process improvement without focus on necessary process improvement abilities. The overall goal of this proposed guide is to strengthen these needed abilities for process improvement in organizations before starting on process improvement and to strengthen those during the improvement at all capability levels.
 	
This NWI will be based on the ISO/IEC 15504 - Part 4: Guidance on use for process improvement and process capability determination and ISO/IEC TR 15504 — Part 7: Guide for use in process improvement with additional contributions from work performed in Japan and Denmark.
 	
This proposed new part will focus on guidance for success with process improvement, and what should be in place in an organization to ensure success with process improvement initiatives and programs, e.g.:
 	
• Define scope of change,
• develop change strategy,
• identify foci depending on e.g. scope of the improvement, type of organization and change strategy, like
    o Foundation: such as Vision and strategy and Knowledge management,
    o Initialization: such as Urgency sensing and Idea processing
    o Process improvement project: such as Project goal and requirements, Project competence and knowledge and Management involvement,
    o Deployment: such as Deployment strategy, Roles and responsibility and Operations and maintenance,
• identification of necessary improvement abilities to be increased,
• increase the improvement abilities and selection of the best strategy for that,
• identify responsibilities, roles, competence in the organization where the process improvement is conducted.

Programme of work

If the proposed new work item is approved, which of the following document(s) is (are) expected to be developed?

____ a single International Standard

___ more than one International Standard (expected number: ....)
____ a multi-part International Standard consisting of .... parts
____ an amendment or amendments to the following International Standard(s) ....
__X_ a technical report , type .....3......

And which standard development track is recommended for the approved new work item?

__X_ a. Default Timeframe

____b. Accelerated Timeframe

____c. Extended Timeframe

Relevant documents to be considered

- ISO/IEC JTC1/SC7 N4352 – Final Study Group Report on the Revision of ISO/IEC 15504
- ISO/IEC 15504-1:2004 Information technology -- Process assessment -- Part 1: Concepts and vocabulary.
- ISO/IEC 15504-2:2003 Software Engineering - Process Assessment - Part 2:Performing An Assessment
- ISO/IEC 14404-3:2004 Information technology -- Process assessment -- Part 3: Guidance on performing an assessment
- ISO/IEC 15504-4:2004 Information technology -- Process assessment -- Part 4: Guidance on use for process improvement and process capability determination
- ISO/IEC 15504-5:2006 Information technology -- Process Assessment -- Part 5: An exemplar Process Assessment Model
- ISO/IEC 15504-6:2008 Information technology -- Process assessment -- Part 6: An exemplar system life cycle process assessment model
- ISO/IEC 15504-7:2008 Information technology -- Process assessment -- Part 7: Assessment of organizational maturity
- ISO/IEC WD 15504-8 Information technology – Process assessment – Part 8: An exemplar assessment model for IT Service Management
- ISO/IEC PDTR 15504-9 Information technology – Process assessment – Target process profiles
- NWIP – ISO/IEC 15504-10 Information technology – Process assessment – Safety extensions
- Jan Pries-Heje & Jørn Johansen, ImproveIT: A book for improving software projects. DELTA, 2007, ISBN 978-87-7398-086-6.
- Mary Poppendick & Tom Poppendick, Lean Software Development: An Agile Toolkit. Addison-Wesley, ISCN-13: 978-0321150783.
- Masaaki Imai, Gemba Kaizen, A commonsense, Low – Cost Approach to Management. McGraw-Hill 1997, ISBN-13 978-0070314467.

Co-operation and liaison

- ISO/IEC/JTC1/SC7/WG7 (Software and Systems Life Cycle Processes)
- ISO/IEC/JTC1/SC7/WG25 (Service Management)

Preparatory work offered with target date(s)	
Members from Australia, Finland, Germany, India, Japan, South Africa, UK, USA intend to work jointly to develop and submit an initial working draft following approval of the NWI prior to a first meeting.	
Support for this New Work Item Proposal has been offered by Australia, Finland, Germany, India, Japan, South Africa, UK, SPICE User Group.	
Project co-editors have been offered by Jørn Johansen (Denmark) and Dr. Kiyoshi Ogawa (Japan)	

Signature: A Dorling, WG10 Convener

Will the service of a maintenance agency or registration authority be required? No ....
- If yes, have you identified a potential candidate? ....
- If yes, indicate name ....

Are there any known requirements for coding? ....No
-If yes, please specify on a separate page

Does the proposed standard concern known patented items? ....No
- If yes, please provide full information in an annex

Comments and recommendations of the JTC 1 or SC XXSecretariat - attach a separate page as an annex, if necessary

Comments with respect to the proposal in general, and recommendations thereon:
It is proposed to assign this new item to JTC 1/SC 7/WG10 and developed as ISO 31012

Voting on the proposal - Each P-member of the ISO/IEC joint technical committee has an obligation to vote within the time limits laid down (normally three months after the date of circulation).

Date of circulation: YYYY-MM-DD	Closing date for voting: YYYY-MM-DD	Signature of Secretary:

NEW WORK ITEM PROPOSAL - *PROJECT ACCEPTANCE CRITERIA*		
Criterion	**Validity**	**Explanation**
A. Business Requirement		
A.1 Market Requirement	Essential _X_ Desirable ___ Supportive ___	Refer to 6.3 of the attached Study Group Report
A.2 Regulatory Context	Essential ___ Desirable ___ Supportive ___ Not Relevant _X_	
B. Related Work		

B.1 Completion/Maintenance of current standards	Yes _X__ No__	Refer to Section 1 of the attached Study Group Report
B.2 Commitment to other organisation	Yes ___ No_X__	
B.3 Other Source of standards	Yes ___ No_X__	
C. Technical Status		
C.1 Mature Technology	Yes __X_ No___	Refer to Section 5 of the attached Study Group Report
C.2 Prospective Technology	Yes __X_ No___	
C.3 Models/Tools	Yes ___ No__X_	
D. Conformity Assessment and Interoperability		
D.1 Conformity Assessment	Yes ___ No__X_	
D.2 Interoperability	Yes ___ No_X__	
E. Cultural and Linguistic Adaptability	**Yes____** **No__X___**	
F. Other Justification		

Notes to Proforma

A. Business Relevance. That which identifies market place relevance in terms of what problem is being solved and or need being addressed.

A.1 Market Requirement. When submitting a NP, the proposer shall identify the nature of the Market Requirement, assessing the extent to which it is essential, desirable or merely supportive of some other project.

A.2 Technical Regulation. If a Regulatory requirement is deemed to exist - e.g. for an area of public concern e.g. Information Security, Data protection, potentially leading to regulatory/public interest action based on the use of this voluntary international standard - the proposer shall identify this here.

B. Related Work. Aspects of the relationship of this NP to other areas of standardisation work shall be identified in this section.

B.1 Competition/Maintenance. If this NP is concerned with completing or maintaining existing standards, those concerned shall be identified here.

B.2 External Commitment. Groups, bodies, or fora external to JTC 1 to which a commitment has been made by JTC for Co-operation and or collaboration on this NP shall be identified here.

B.3 External Std/Specification. If other activities creating standards or specifications in this topic area are known to exist or be planned, and which might be available to JTC 1 as PAS, they shall be identified here.

C. Technical Status. The proposer shall indicate here an assessment of the extent to which the proposed standard is supported by current technology.

C.1 Mature Technology. Indicate here the extent to which the technology is reasonably stable and ripe for standardisation.

C.2 Prospective Technology. If the NP is anticipatory in nature based on expected or forecasted need, this shall be indicated here.

C.3 Models/Tools. If the NP relates to the creation of supportive reference models or tools, this shall be indicated here.

D. Conformity Assessment and Interoperability

D.1 Indicate here if Conformity Assessment is relevant to your project. If so, indicate how it is addressed in your project plan.

D.2 Indicate here if Interoperability is relevant to your project. If so, indicate how it is addressed in your project plan

E. Cultural and Linguistic Adaptability   Indicate here if cultural and linguistic adaptability is applicable to your project. If so, indicate how it is addressed in your project plan.

F. Other Justification   Any other aspects of background information justifying this NP shall be indicated here