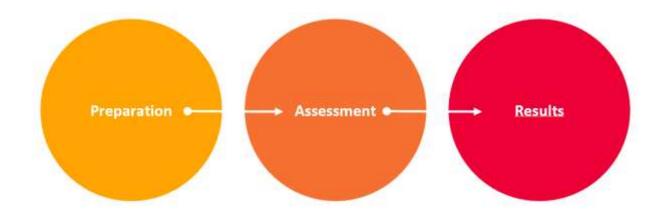
Extensive Guide for ISO 56000 Assessments for TIMS

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1. Innovation Management Assessment Preparation



1.1. Select the processes to be assessed

Look at all processes from the model and select the processes that will be assessed. This can be only a small selection of the existing processes (e.g. Leadership, Idea Management Process). In the appendix of this document you will find a list of the processes with short descriptions of each process. From these processes choose the processes that you will assess with your assessment team.

1.2. Align with Stakeholders

Ask who will be involved in the assessment and how they will be involved in the assessment process. Also, clarify if an entire organization will be assessed or only certain departments/units. Communicate with stakeholders what the outcome of such an assessment will be (summarized report, detailed report, benchmarks, see chapter 3.2.) and how they will be involved (Interview plan, see chapter 1.3.).

Relevant stakeholders could be:

- Sponsors (who will pay for the assessment)
- Organisation / Department
- Suppliers
- Partners and Collaborators
- Stakeholders to whom the results will be presented
- The Assessment Team
- Etc.

IMPORTANT: Ensure Management Commitment

Ensure that all stakeholders have a common understanding of the trigger and objective for the IMA:

- Why the organization initiates the assessment
- What the strategic intent of the assessment is

Define also what is NOT in the scope of the assessment!

1.3. Select the Assessment Team

Part of the assessment team are the:

- Assessment Coordinator: Important if the assessors are external
- Assessors: internal or external assessors, ensure the resources (budget) for external
 assessors
- Lead Assessor: Leading the assessment with co-assessors
- Project team members: to be interviewed

Kick-Off

First:

Explain to the project team members and corporate management

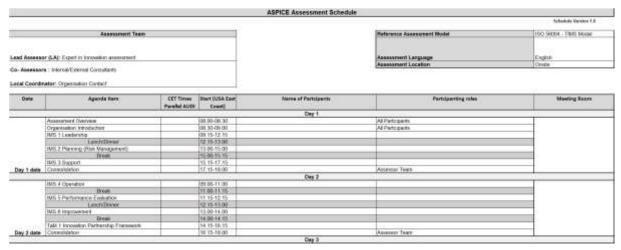
- o the purpose,
- o scope,
- constraints and
- o model
- o assessment approach (interviews, data collection etc.)

to be used in the assessment.

Then:

- Introduce the assessors
- Identify and document potential risks in executing the assessment successfully as well as appropriate risk mitigation strategies.
- Prepare the interview plan (see example below)
- Ensure the availability of the project team members
- Based on the scope define the duration and effort for the assessment
- Invite project team members to the assessment based on their roles in the project

• Define how the assessment data will be collected and recorded (e.g. assessment tool to be used)



1.4. Select an Assessment Tool

Requirements for the Assessment Tool:

- ISO56000 Model support
- possibility to rate and document findings
- Generate Assessment Report
- Allow multiple assessor to work on the assessment in the same time (web based solution)
- Supporting consolidation of results
- https://iso56000.eurospi.net/

1.5. Self-Assessment vs. Assessment with Coaching

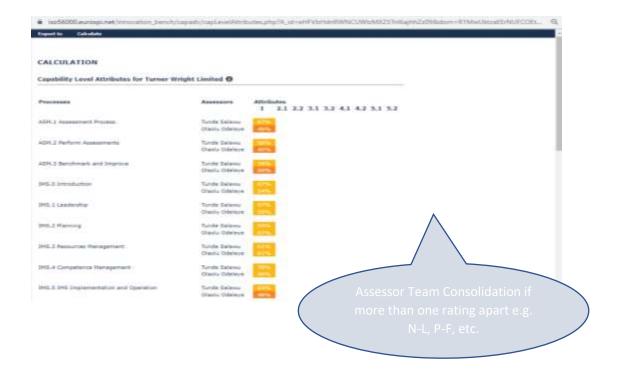


- Case 1 Self Assessment without Coaching
 - Self assessor plans time per process to rate and answer
 - Internal interview plan
 - Self Assessor rating
 - Process attribute rating
 - Capability profile
 - Derived action plan
- Case 2 Coaching Assessment

- Self Assessor rating
- Coaching Interviews
- Rating by Coaching assessor
- Comparing the rating and conclusions
 - Comparing attribute profile
 - Comparing capability profile
 - Deriving action plan in cooperation with coach
 - Re-assessment with coach after implementation of actions
- Interview plan required (see previous slide)
- Self Assessments have one assessor
- Team assessments have more than one assessor who agree the findings and ratings



- Self Assessments have one assessor
- Team assessments have more than one assessor who agree the findings and ratings



2. Innovation Management Assessment Process

2.1. ISO/TR 56004 Innovation Management Assessment Process

What is the Objective of an Assessment?

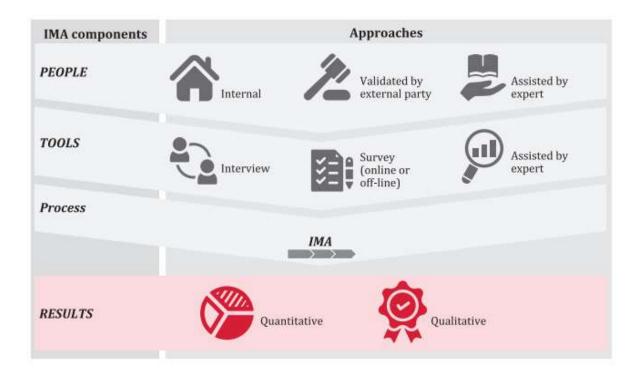
- Gain a better understanding of the Innovation Management Processes in the Organization
- Identify strengths/weaknesses and determine the performance of the current Innovation Management Processes
- Meet internal or external requirements (e.g. certain Innovation Management Maturity)
- Improve the performance and increasing the value of the organization → to reach the level of a high-performing innovator.
- Benchmark with other organisations

Requirements from the ISO/TR 56004

- No clear requirements or process how to conduct an Innovation Management Assessment (IMA)
- It can be a very **simple** high-level scan, based on only a few questions or very detailed investigation, based on qualitative and/or quantitative questions.

- It can be performed **internally** by a dedicated team or **external** assessors/experts
- A combination of interviews, surveys and desk research can be used to produce assessment results.

Key components of, and approaches to, Innovation Management Assessment



BENCHMARKING?

- To compare assessment results, the same approach has to be used
- The assessment shall be conducted based on an agreed set of questions/expected outcomes
- A rating scale shall be unified
- The process capability/maturity must be measured
- Same level of understanding and expectations for Innovation Management Process outcomes has to be ensured

ISO Standards for Process Assessment

Any ISO Standards for Process Assessment to Support the IMA Assessment?

ISO/IEC 330XX: Series of standards for Process assessments

INTERNATIONAL STANDARD

33020

Second edition 2019-11

Information technology — Process assessment — Process measurement framework for assessment of process capability

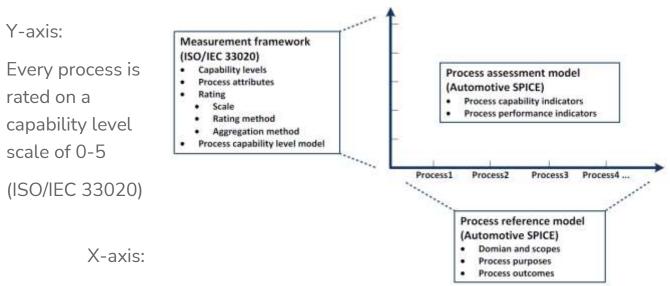
Technologies de l'information — Évaluation du processus — Cadre de mesure du processus pour évaluer la capacité du processus

ISO 33020

- Defines a process measurement framework for the process quality characteristic of process capability.
- The process measurement framework in the ISO 33020 conforms to the requirements of ISO/IEC 33003 and is applicable to any domain.
- The process measurement framework defined in the ISO 33020 forms a structure which
 - facilitates self-assessment,
 - provides a basis for use in process improvement and process quality determination,
 - is applicable across all application domains and sizes of organization,
 - produces a set of process (capability) attribute ratings (process profile), and
 - derives a process capability level

2.2. Process Assessments based on ISO 33020

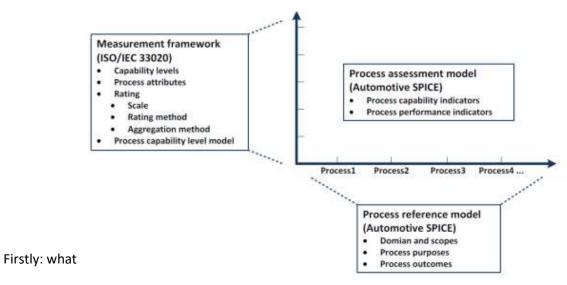
Overall Rating Concept ½



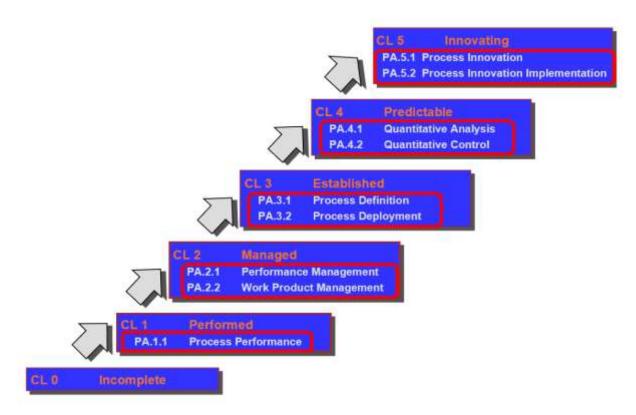
Every process is described with purpose, practices, and work products (ISO/IEC 33004)

Overall Rating Concept 2/2

- Capability level Profile:
- Every process has a capability level and in total a process profile is presented



Every process for level 1 needs to fulfil so called base practices (doing) and on level 2-5 efficiency and effectiveness of the doing is rated.



Secondly: What rating can be given to a Process Attribute

Not achieved 0% to 15 %

"There is little or no evidence of achievement of the defined attribute in the assessed process."

Partially achieved > 15 % to 50 %

"There is some evidence of an approach to, and some achievement of, the defined attribute in the assessed process. Some aspects of achievement of the attribute may be unpredictable."

Largely achieved > 50 % to 85 %

"There is evidence of a systematic approach to, and significant achievement of, the defined attribute in the assessed process. Some weakness related to this attribute may exist in the assessed process."

Fully achieved > 85 % to 100 %

"There is evidence of a complete and systematic approach to, and full achievement of, the defined attribute in the assessed process. No significant weaknesses related to this attribute exist in the assessed process."

Rating Interpretation in Practice

Not achieved 0% to 15 %

Outcome/achievement not existent, or content judged inacceptable

Partially achieved > 15 % to 50 %

Some outcomes/achievements implemented, but projects/OUs still incapable of reaching quality, time, or budget goals & targets

Largely achieved > 50 % to 85 %

Outcome/achievement implies a significant likelihood, however no certainty, of reaching quality, time, and budget goals & targets

Fully achieved > 85 % to 100 %

No process risk with respect to quality, time, budget goals & targets identified, even in presence of imperfections

Rating Example

- Rating Not
 - Only 10% of the collected innovation ideas have been reviewed so far.
 - Only 10% of the planned innovation tasks have been planned so far.
- Rating partially
 - One third of the collected innovation ideas have been reviewed so far.
 - One third of the planned innovation tasks have been planned so far.
- Rating largely
 - Two thirds of the collected innovation ideas have been reviewed so far.
 - Two thirds of the planned innovation tasks have been planned so far.
- Rating fully
 - More than 85% of the collected innovation ideas have been reviewed so far.
 - More than 85% of the planned innovation tasks have been planned so far.

Process Definition

- Identifier
- Name
- Purpose Statement
- Outcome List
- Base Practices

Process Definition Example – Ams.1 Assessment process 1/3 (ISO/IEC 33004)

Identifier: ASM.1

- Process name: Assessment Process
- Purpose Statement: The purpose of this process is to establish and define a continuous innovation management assessment and improvement cycle.

Process Definition Example – Ams.1 Assessment process 2/3

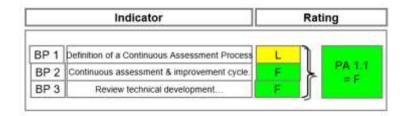
- Outcomes of ASM.1
 - 1. An innovation management assessment process is defined based on international norms that allow innovation assessment benchmarking
 - 2. A continuous improvement cycle of innovation assessments and improvements is defined / established
 - 3. Improvement action plans are established and tracked.

Process Definition Example - Ams.1 Assessment process 2/3

- Base Practices
- AMS.1.BP1 Definition of a Continuous Assessment Process. There is a defined set of areas/processes which are assessed to evaluate the innovation capability of the organisation. (relates to Outcome 1)
- AMS.1.BP2 The intent of the IMA is based on a continuous assessment and improvement cycle is defined. The innovation management system assessments are planned, continuously repeated in cycles and improvement action plans for the IMS are derived and tracked. (relates to Outcome 2)
- AMS.1.BP3 The process to identify and maintain improvements is established. The
 assessment results include a report of strengths and weaknesses and for the weaknesses
 actions are defined, and tracked, and solved. Solved issues are being re-evaluated in the next
 assessment. (relates to Outcome 3)

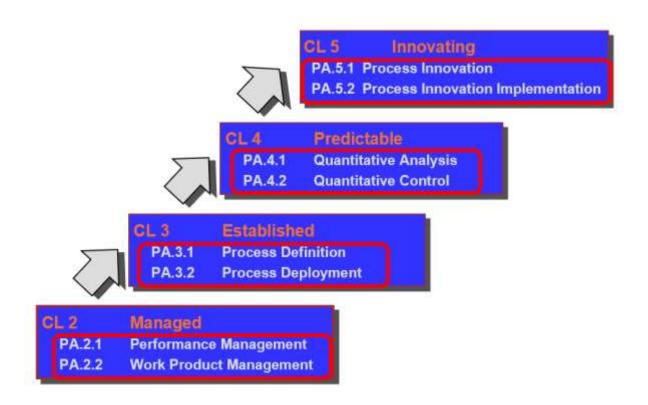
Rating Level 1 – example for process "ASM.1"

- Rating Level 1 means rating of base practices with N/P/L/F
- Rating the process attribute PA 1.1 (see Capability Levels) means to aggregate all N/P/L/F ratings and map them to a N/P/L/F percentage scale for the process on level 1
- E.g. average algorithm for values N = 0, P = 0.33, L = 0.66, F = 1.
- Note: The assessor community allows for experienced assessors to overrule this average based percentage algorithm.

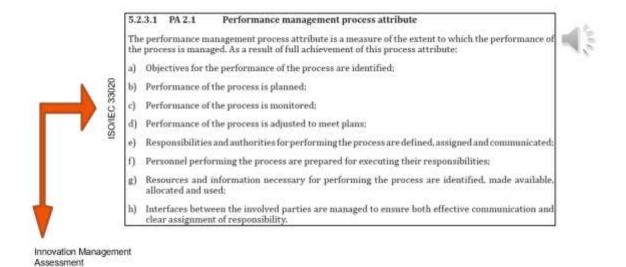


Rating at Higher Levels

- Each PA (Process Attribute) has generic efficiency and effectiveness practices.
- They are called GPs (Generic Practices) since they are asked generically for each process separately.
- Also GPs are rated with the N/P/L/F scale.



PA 2.1 GP 2.1.x are derived from the corresponding 'PA achievements' defined in ISO/IEC 33020



GP 2.1.1 Identify the objectives for the performance of the process and apply metrics and methods to track the objectives. (a, b, c, d)

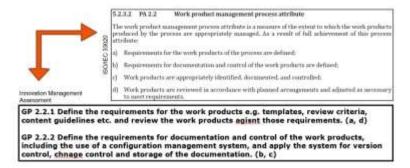
GP 2.1.2 Define roles with responsibilities and authorities for performing the process, and assign human resources to the roles including resources and communication plans. (e, f, g, h)

Rating level 2 to 5 = Rating Generic Practices based on the ISO 33020 Measurement Framework

Interpretation Example ASM.1 for PA 2.1 Performance Management

- GP 2.1.1
 - #of assessments planned, e.g. 1 per year per product or service domain
 - Gantt plan / schedule showing the assessment and improvement milestones and activities.
 - Monthly status report about improvement actions derived from assessments
 - Escalation of action items which are overdue more than 4 weeks.
- GP 2.1.2
 - the role of assessors, and assessment coordinator are assigned.
 - Resources for assessments and improvements are available as a budget.
 - The assessment results and improvement actions are reported in regular meetings.

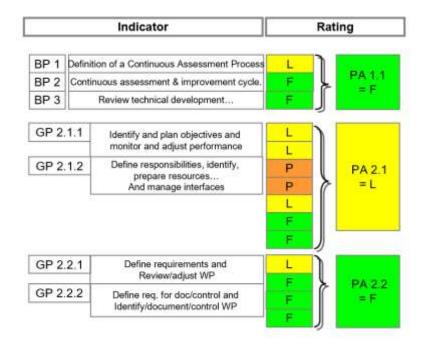
PA 2.2 GPs 2.2.x are derived from the corresponding 'PA achievements' defined in ISO/IEC 33020



Rating level 2 to 5 = Rating GEneric Practices based on the ISO 33020 measurement Framework Interpretation Example ASM.1 for PA 2.2 Work Product Management

- GP 2.2.1
 - There are templates for assessment reports, templates for planning the assessments, standard fields to be used in tracking actions
 - The IM team applied these tools and results are stored as panned.
- GP 2.2.2
 - There is a plan where the documents and assessment results are stored and which tracking system is to be used.
 - The assessment reports and the actions are regularly reviewed and review feedback is considered.

Rating e.g. Level 2 – example for process "ASM.1"



Process Attribute Profile

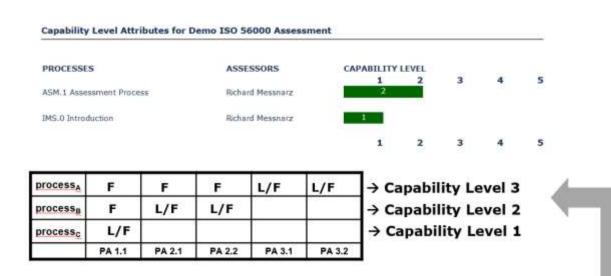
Each process area shown with a rating per process

CALCULATION



Process Capability Profile

 Each process area shown with a capability level, the capability level calculation is standardised by ISO 33020.



A capability level X is reached if its PAs are at least "L", and all lower PAs are "F"

mprovements in Institutionalized Organizational unit's mprovements processes Monitor Sustain Process improvement performance improvements urrent onfirmed initiation erformance mprovements Confirm Examine organization's improvements business goals Organization mplemented needs PI objectives nprovements Implement Initiate process improvements improvement cycle Analyzed Re-assessment Re-assessment request Pl Implementation results Develop Assess current action plan action plan capability benchmarks

Continuous assessment and improvement cycle

3. Performing an Innovation Management Assessment

- Part 1: Conduct an Innovation Management Assessment
- Part 2: Example of conducting an assessment
- Part 3: Conclude an Innovation Management Assessment
- Part 4: Start an Improvement Program

3.1. Assessment Setup, Basic Terms and Examples

Requirements from the ISO/TR 56004

- A successful IMA is likely to be performed in the following sequence:
 - set-up of the tool(s);
 - quantitative and qualitative data collection;
 - data analysis;
 - identification and development of recommendations for IM and IMA improvement.

- Ensure that the Assessment is created for the processes in scope in the selected tool →https://iso56000.eurospi.net/
- Ensure that all co-assessors have access to the tool
- Ensure that all co-assessors are familiar with the tool → e.g. provide coaching or send them guidelines or instructions how to use the tool



Access to Portal

https://iso56000.eurospi.net

- Web based assessment portal
- ISO 56000 and ISO 33020 combined



Access to Portal

https://iso56000.eurospi.net

- LOGIN TIMS REGISTRATION
- Register once and remember your userid and password.
- Next time do NOT register again, just LOGIN as an Assessor.



- LOGIN TIMS REGISTRATION
- Register once and remember your userid and password.
- Next time do NOT register again, just LOGIN as an Assessor.



- LOGIN TIMS REGISTRATION
- Register once and remember your userid and password.
- Next time do NOT register again, just LOGIN as an Assessor.



Please select one of the following assessments:

- Test Company Athens 2
 - » Test Company Athens 2 ISO 56000 Assessment

Select the company

Data Collection

- Collect data prior/for to the assessment (if possible) such as:
 - Innovation vision, strategy
 - Innovation and organization and culture
 - Organization structure

- Results of innovation
- Be aware! Not all data can be collected before or for the assessment, especially if the assessment is performed on an external organisation!
- Typically some data is collected before but most of the data is collected during the assessments in interview sessions.
- Data which is collected for the assessment and used to rate the process is called evidence.

Evidences

- Evidences are data which is collected and used to rate the process!
- This could be:
 - Documents, Procedures
 - Results of Innovation Management Projects
 - Reports, Records, Measurements, Minutes, E-Mails
 - Results documents in Tools
 - Demonstrations of a system

Data analysis

- The data analysis step is focused on the interpretation of data and gap identification! (see ISO 56004 Part 8.3.1)
- The results shall lead to the understanding of the root causes of the Innovation Management strengths and weaknesses that have been identified.
- Typically in an Assessment the data collection and data analysis steps are often combined.
- Interview sessions are used to assess the process with the performer(s) of the process
- During the interview notes are taken by the assessors and evidences documented which were provided.
- Based on the interview statements and evidences the process is being rated.

Access to Portal

- Tree of Processes
- Level 1 (Base Practices) per process WHAT IS DONE
- Levels 2 to 5 (Generic Practices) How efficient it is done (ISO 33020)



Select the assessment

- Tree of Processes
- Level 1 (Base Practices) per process WHAT IS DONE
- Levels 2 to 5 (Generic Practices) How efficient it is done (ISO 33020)

Select a process in the process list

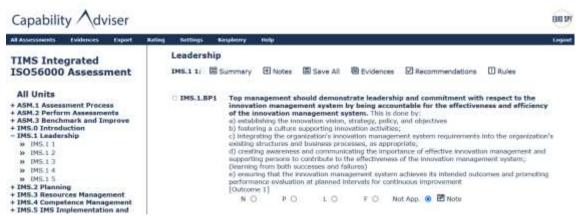


Levels 2 to 5 (Generic Practices) - How efficient it is done (ISO 33020)



Select level 1 to see the base practices (what needs to be done)

- Per Process on Level 1 the Base Practices
- Base practices rated with N(ot)/P(artially)/L(argely)/F(ully)
- Commenting is possible Strengths/Weaknesses



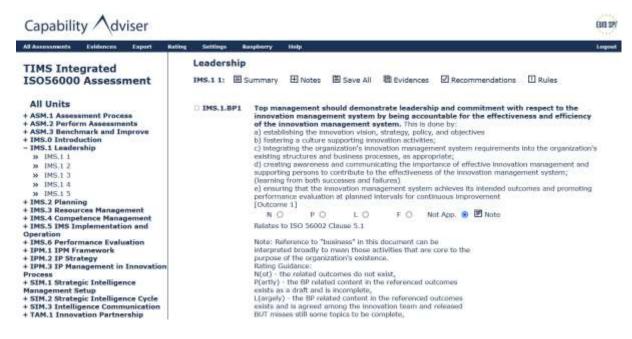
Base Practices with rating scale

- Per Process on Level 1 the Base Practices
- Outcomes are mapped by numbering e.g. Outcome 1

Click Base Practice Text to see the Outcomes



- Per Process on Level 1 the Base Practices
- Related norm chapters can be displayed



Click Base Practice ID to get the underlying norm mapping

- Per practice the rating can be commented
- Strengths, Weaknesses, Comments in general



Open Comment Windows with Menu Item Notes, Open Comment Windows with Menu Item Notes
Best practices for performing Interviews

- Use sequences of open/probing/closed questions to control the information flow efficiently.
- Ask your questions in a way that the coverage of the model is not accidental but wellmanaged
- When it comes to weaknesses doublecheck with the interviewees that you are on the same page
- The interviewee usually doesn't understand the model and its terminology, and you have to translate your question accordingly.
- You might need to do some tutoring and give examples to get the interviewees ready for your question.

Example on how an assessment is performed

3.1.1. Step 1: Align the scope

- Contact the assessment sponsor and align on the processes to be assessed e.g. Innovation
 Management System
- Align the interview plan with the sponsor/coordinator

Date	Process	Start Time	End Time	Interview	Support
	Opening Meeting / Company Presentation	08:30	08:45	Innovation Team	
	IMS.1 Leadership	08:45	09:45	D. Smith - Project Manager	J. Jones Department Manager
	Break	09:45	10:00		
15.06.2023	IMS.2 Planning	10:00	11:15	D. Smith - Project Manager	J. Jones Department Manager
	Break	11:15	11:30		
	IMS.3 Resources Management	11:30	12:30	D. Smith - Project Manager	J. Jones Department Manager
	Lunch	12:30	13:30		
	IMS.4 Competence Management	13:30	13:30	K. Wiliams (HR)	D. Smith - Project Manager

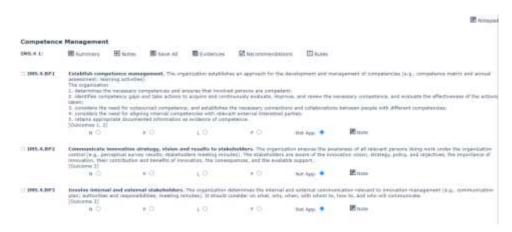
3.1.2. Step 2: Collect data

- Collect Data before the Interview
- For Competence Management this could be:
 - Competence Matrix
 - Roles and Responsibilities in the Organisation
 - Training Plan
 - Evidences of Trainings Performed
 - List of External Staff

 Typically this kind of documentation is considered as sensitive date, the organization can also send only templates or examples without any actual data in order that the assessor prepares before the interviews

3.1.3. Step 3: Start Assessment

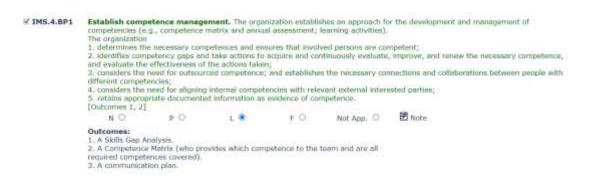
• Login to the Assessment Tool and select the process to be assessed:



3.1.4. Step 4: Perform Interview

Check for Outcomes

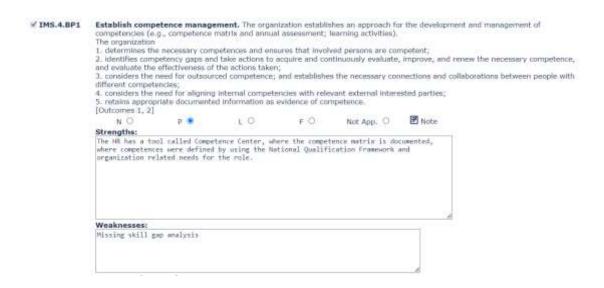
Go through the Outcomes from the Process and check for existing of the outcomes.



 Ask the Interview to show you the Skill Gap Analysis and the Competence Matrix (only Outcomes 1 and 2 are relevant to this BP)

3.1.5. Step 5: Rate the Outcomes and Document the Strengths/Weaknesses

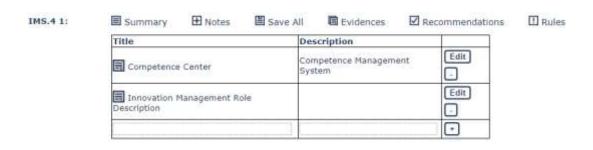
After the interviewed person explained and showed you the competence matrix, you need to document what was presented to you as an evidence and perform a rating



3.1.6. Step 6: Document Evidences

Document which evidences have been presented by the interviewed person.

It must be evident on what basis the rating has been performed and what evidences were presented.



3.1.7. Step 7: Continue with the next Base Practice

Perform the interviews for the next Base Practice



Rating Scale

• ISO 56004 is not defining any rating scale, therefore as a best practice the rating scale from the ISO/IEC 33020 has been reused!

Access to Portal

Per assessment the rating of all processes can be seen based on ISO 33020 profiles

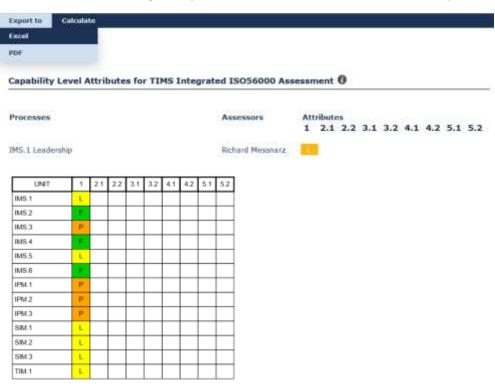


Per assessment the rating of all processes can be seen based on ISO 33020 profiles

Each process per level shown with an aggregated N/P/L/F rating



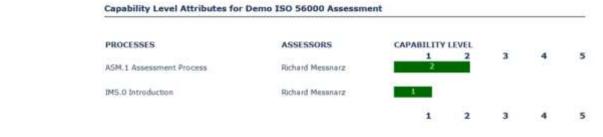
Per assessment the rating of all processes can be seen based on ISO 33020 profiles



PDF file – profile exported

Each process area shown with a capability level

Each process area shown with a capability level

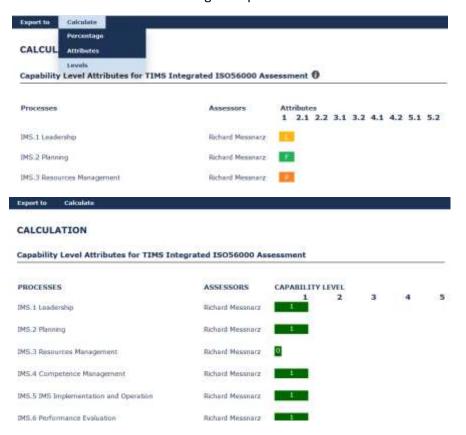


process	F	F	F	L/F	L/F	→ Capability Level 3
process	F	L/F	L/F			→ Capability Level 2
process _C	L/F					→ Capability Level 1
	PA 1.1	PA 2.1	PA 2.2	PA 3.1	PA 3.2	

A capability level X is reached if its PAs are at least "L", and all lower PAs are "F"



Per assessment the rating of all processes can be seen based on ISO 33020 profiles



3.2. Reporting: Conclude the Innovation Management Assessment

Document findings

- Findings from the assessment must be documented in order to derive an action plan.
- The action plan shall provide an overview of all measures and their expected benefits
- The assessors can support the organization to derive an action plan, or an internal improvement team creates from the findings the appropriate measures
- Typically assessment results are documented in detail in an Assessment Report

Assessment

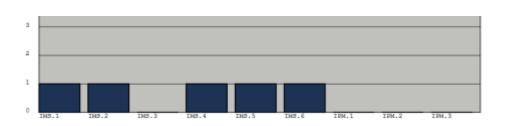
Report

• The ISO 56004 provides an example for the structure of an assessment report:

Section	Description
Management Summary	Brief description of the IMA trigger, procedure and its outcomes and actions for improvement
Instructions	An explanation on how to read the report.
Overview	Description of the main results and proposed actions arising from the IMA, suitable for a non-specialist audience
Performance for each as- sessment area	Description of the scores obtained from the data, ideally framed in positive terms, showing strengths, weaknesses, and gaps indicating the results of the assessment.
Detailed evaluation of each criterion/section	Comparison and interpretation of data, and any caveats.
IM improvement recom- mendations	Recommendations, actionable roadmap and action plan for improvement. A set of prioritized recommendations for improving the IM performance, based on the key findings of the analysis above. Recommendations may also include identifying areas that require more detailed analysis.
Glossary	List and definition of key terms used in the document, ideally with links to more detailed publications on relevant topics.
Annexes	For example, a detailed description of the data that was collected, ideally represented graphically.

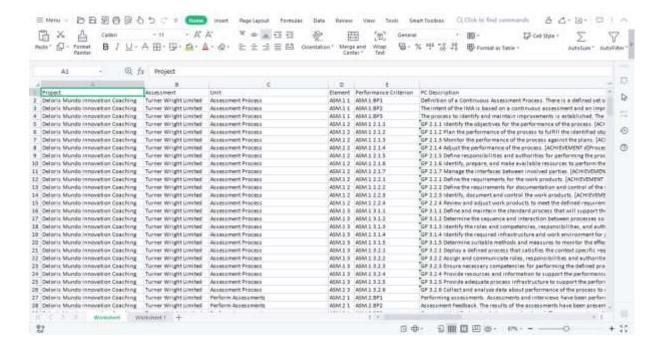
Per assessment the rating of all processes can be seen based on ISO 33020 profiles





Export - PDF

- Per assessment the ratings can be exported with all comments
- In Excel e.g. they can be filtered for N,P,L ratings (where improvements are required) and actions are derived



Report - Excel

Example of an Assessment

Report

 Per assessment the single practice ratings can be shown as a map and areas with low rating can be selected to develop improvement plans



3.3. Recommendations for an Assessment Report

Suggestions for the content of an Assessment Report in practice

Content

- process profiles
- management summary
- process weaknesses
- process strengths
- improvement suggestions (optional)

Benchmarking

- Provide comparisons to other organizations
- Compare to previous assessments

3.4. Start an Improvement Program

Recommendations for Improvement

- With the Assessment Report the understanding of the organization's strengths and weaknesses is supported
- Recommendations for improvement can be tailored based on:
 - organization's strategic intent to innovate
 - organization's level of ambition to innovate

- the urgency to improve
- etc.

Recommendations for Improvement

- The recommendation shall include:
 - prioritized actions
 - a clear definition of the expected output
 - a clear timeline: define short, mid and long-term objectives;
 - clear responsibilities;
 - effort required to implement the recommendation
- It must be ensured that the implementation of the recommendation is constantly monitored

Creating an Improvement Plan

- Processes with low rating are selected and the evidences and comments for the low rated practices are analysed in a workshop
- The workshop delivery improvement options to increase the rating in those practices and the process and hereby implementing ISO 56000 as a good practice of innovation
- Usually these actions are entered to an action list and tracked monthly.
- Top management commitment is required to assure resources for the implementation of the action plan.
- Usually the assessors become coaches and will do a re-assessment after ca. 1 to 1,5 years.