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Innovation management - Part 6: Creativity management

Innovationsmanagement - Kreativitätsmanagement

Management de l'innovation - Partie 6 : Management de la créativité

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Innovation management - Part 6: Creativity management

Management de l'innovation - Partie 6 : Management de la créativité

Innovationsmanagement - Kreativitätsmanagement

This draft Technical Specification is submitted to CEN members for formal vote. It has been drawn up by the Technical Committee CEN/TC 389.

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EUROPEAN COMMITTEE FOR STANDARDIZATION
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Foreword

This document (FprCEN/TS 16555-6:2014) has been prepared by Technical Committee CEN/TC 389 “Innovation Management”, the secretariat of which is held by AENOR.

This document is currently submitted to the Formal Vote.

This document is not intended for the purpose of certification.

The CEN/TS 16555 series consists of the following parts with the general title *Innovation management*:

— *Part 1: Innovation Management System*;

— *Part 2: Strategic intelligence management*;

— *Part 3: Innovation thinking*;

— *Part 4: Intellectual property management*;

— *Part 5: Collaboration management*;

— *Part 6: Creativity management*;

— *Part 7: Innovation management assessment.*

Part 7 is in preparation.

Introduction

Innovation is the implementation of a new or significantly improved product, service, process or working practice. This includes new marketing methods and business models. The critical step on the road to innovation is the idea or inspiration that provides the impetus to commit the time and resources necessary to bring it to fruition.

This document focuses on the creation and identification of new ideas and opportunities that can lead to innovation. It outlines the conditions necessary to inspire ideas and their subsequent collection, selection and development. In keeping with the emphasis of this Technical Specification, particular attention is given to idea generation within small and medium-sized enterprises (SMEs), their organizational structures and needs.

Different levels of innovation are considered: incremental, radical and disruptive, and the implications of each level for organizations and their innovation management systems. Case studies are included in Annex A to provide insight through the experience of others. Collaboration is often essential to the successful inception and development of new ideas and is covered in more depth in CEN/TS 16555-5, *Innovation management — Part 5: Collaboration management*. In addition, this document complements CEN/TS 16555-3, *Innovation management — Part 3: Innovation thinking.*

1 Scope

This Technical Specification provides guidance for managing the process of originating new ideas from which innovations may be developed.

It is applicable to all types of organization including manufacturing and services industries, the voluntary sector, governmental and social enterprise but with a particular focus on small- and medium-sized enterprises (SMEs).

The guidance in this TS covers issues to be considered by those responsible for managing innovation, in particular during the creative phase, and the sourcing of ideas from within and outside the organization.

This document is one of six parts that support Part 1 of the series, CEN/TS 16555-1, *Innovation management — Part 1: Innovation management system.*

2 Normative references

The following document, in whole or in part, is normatively referenced in this document and is indispensable for its application. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

CEN/TS 16555-1:2013, *Innovation Management — Part 1: Innovation Management System*

CEN/TS 16555-3, *Innovation management — Part 3: Innovation thinking*

3 Terms and definitions

For the purposes of this document, the terms and definitions given in CEN/TS 16555-1 and the following apply.

3.1
creativity
process of generating new ideas through original thinking

Note 1 to entry: This can range from an artistic design to an invention and includes, for example, new business ideas and management processes.

3.2
disruptive innovation
new technology that has the potential to make the current practice obsolete or create a new one

Note 1 to entry: The novelty of such ideas, however, can mean slow adoption by the market and so carries greater risk for the innovator. Examples include the bagless vacuum cleaner and tablet computer.

3.3
incremental innovation
repeated small improvements to a product, service or process over time to improve revenue, efficiency and working practices

3.4
radical innovation
step change in current practice that introduces something new to the world

Note 1 to entry: Often results in replacing existing technology or methods, for example, the Internet.

4 Understanding creativity within an organization

In CEN/TS 16555-1:2013, 11.6, it briefly describes creativity management and how it is possible to successfully manage creativity by following a clear set of principles that stimulate the generation of new ideas; this document provides more detail.

It is important to distinguish between creativity and innovation within the context of working within an organization. Creativity is the process of identifying problems and the generation of ideas to solve those problems whereas innovation involves the selection, development and successful implementation of creative ideas.

Managing creativity requires a different approach to managing other functions within an organization. The management activity should be confined to the support structure and mechanisms around creativity and not the process of creativity itself. However, setting up the conditions that are the most conducive to people having new ideas does not guarantee that they will. Ideas occur to people under a wide variety of circumstances, for example, through chance, through working hard on a problem or while relaxing. Ideas can also be generated from interactions with colleagues, customers, researchers and other stakeholders. Wherever and however ideas occur, they should be written down or recorded so they are not lost.

A hands-off approach allows those thinking and working, individually or collectively, to find a productive methodology. This can involve being challenged by their peers. However, challenge from those in authority or from a fiscal perspective can have a negative effect. Constructive criticism can be as powerful a motivator as approval.

5 Creative leadership and setting policy

The process of generating creative ideas is integral to a wider ongoing innovation management process (see also CEN/TS 16555-1:2013, Clause 8). As such it should be embedded in an organization's policy, sanctioned and supported by the organization's leadership and accepted by staff and other stakeholders. The leadership should define the reasons for idea creation and the scale of its ambition. This in turn should lead to:

— selecting the best person(s) to manage the creative process;

— fostering a culture conducive to the generation of new ideas;

— determining available competencies and the need for additional training/support;

— defining the level of innovation being sought (incremental, radical or disruptive);

— the allocation of suitable and sufficient resources; and

— deciding from whom and from where ideas will be sourced.

6 Managing the creative process

In line with the organization's policy, the leadership should decide if new ideas are to be sought from within the organization, from affiliated organizations or from outside the organization. One strategy is to find and adapt proven innovations developed by other organizations in different territories, markets or spheres of operation (see A.2, Case study 2).

If from outside, then sources should include:

— selected synergistic organizations: consultants, partners, suppliers and others in the value chain (see A.2, Case study 3);

— a wider group as part of an open innovation ‘call’, ‘competition’ or ‘commission’ to innovation support agencies and consultants;

— individuals on a mass scale, for example, through crowd-sourcing which is the process of soliciting ideas from the public or non-expert group.

If from within the organization then:

— it should be decided if employees should spend time generating ideas in company time or in their own time;

— if in company time, resources should be allocated on a time and/or monetary basis against which employees can log, thereby legitimizing the activity.

It is important to match the people in the organization from whom ideas are to be sourced, to the innovation outcome being sought. For example, if improvements to working practices, productivity or management of the organization are required, then all members of the organization can be involved. Alternatively, for a technologically complex problem it may be better to seek ideas from an expert or a multidisciplinary team.

Ideas can be sought from within an organization in a number of ways by, for example:

— an open policy encouraging employees or others to submit ideas at any time;

— a general call, where the management positively seeks ideas from employees on any subject;

— providing stimulus material or a brief in the form of identified market needs, response to competitors, new technology developments, changes in economic, legal or societal circumstances;

— staging creative events to brainstorm ideas and opportunities around specific issues; or

— a brief focused on a specific problem/opportunity that needs a realizable solution within a time frame.

NOTE In Nordic countries, the introduction of employee driven innovation programmes ensure that all of an organization’s personnel are involved in the process of innovation. As a result, all available knowledge, skill and competence is engaged in workplace innovation.

7 Types of creative ideas

7.1 General

There are two types of creative idea:

1) those that identify a need (a need in search of an answer); and

2) those providing a solution (an answer in search of a need).

Each is as valid as the other and can occur independently. People can be good at one, or the other or both. How the human brain conceives ideas is subject to much research but it is clear that through the assimilation of knowledge, experience and first-hand observation, novel and unexpected connections can occur. It is advisable therefore to expose people to the widest range of stimuli and information, both inside and outside their areas of expertise. For example subscribing to trade and technical journals/newsletters, attending seminars and conferences in parallel or related spheres of activity.

7.2 Ideas identifying a need

The likelihood of an innovation succeeding is significantly increased if the need for it can be established at the outset. One approach to idea generation is to find previously unknown needs or wants through a variety of techniques, which include:

— strategic intelligence, patent database searches and market analysis;

— networking, e.g. with peers, attending industry events, exposure to the state-of-the-art, parallel and competitive activities and future challenges;

— observational, ethnographic and field research; (see A.1, Case study 1);

— collaboration with customers, partners or academic institutions (collaboration is dealt with in more detail in CEN/TS 16555-5);

— analysis of product, service or system failure;

— personal experience.

EXAMPLE A need in the toothbrush market between expensive electric and cheaper manual brushes was identified. Following a rapid mechanical innovation process, a low-cost battery operated toothbrush for children was launched by a small company. After initial sales success under the original brand, the brush was licensed to a global company for a very considerable sum of money.

7.3 Ideas identifying a solution

A solution idea can be the starting point for an innovation.

Defining the value of a solution idea needs to be extremely rigorous. It is easy to commit resources based on the apparent brilliance of an idea before determining its potential market appeal or usefulness (this can be done using the stage gate process which is explained in more detail in Clause 9). Exploiting solution ideas that are outside the core business of the organization can lead to a need for change in its business model. This is acceptable, if it is an anticipated or a welcome outcome, but if not, searching for an exploitation partner or licensee may be preferable.

EXAMPLE The sticky note which developed out of the accidental formulation of a low tack self-adhesive.

8 Encouraging participation in idea generation – motivation

It is good practice to understand what motivates people to participate in an organization's innovation programme and to share their ideas. The establishment of an innovation culture should be encouraged by providing incentives at an individual level.

Motivators include:

— **altruism** – for the good of the department, organization or country;

— **reciprocity** – financial or material reward, as a challenge or to increase job interest;

— **reputation** – an increase in personal or collective status and respect.