Collaborative Terminology Management
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Klaus-Diirk Schmitz
Institute for Information Management
Facilit 03 - ITRM / IIM
Cologne University of Applied Sciences
klaus.schmitz@fh-koeln.de

Overview
- terminology (management) principles
- terminology solutions in enterprises: supported by standards
  - principles and methods
  - working procedures
  - IT realization
- terminology work as part of the workflow
- terminology: costs and ROI
- conclusion

Sample text
Note: If you omit the password, MultiTerm prompts you for a password when loading, assuming the database is password-protected. If you log on as the system administrator, you are normally asked whether you want exclusive access to the database. This is not the case when opening a database using parameters; in this case, it is assumed that you do want exclusive access. Only when exclusive access is not available, MultiTerm does assume that you still want to take part in normal multi-user operation.

Sample text
password MultiTerm prompts password loading database, assuming the database is password-protected. If you log on as the system administrator, you are normally asked whether you want exclusive access to the database. This is not the case when opening a database using parameters; in this case, it is assumed that you do want exclusive access. Only when exclusive access is not available, MultiTerm does assume that you still want to take part in normal multi-user operation.

Sample text
terminology = vocabulary of a subject field = set of designations belonging to one special language (ISO 1087-1:2000) = Gesamtheit der Begriffe und Benennungen in einem Fachgebiet (DIN 2342)

Sample text
database exclusive access loading log on MultiTerm* multi-user operation open a database parameter password password-protected prompt system administrator

Terminology
**Terminology**

- Communication and knowledge transfer (in a specific subject field) can only work, if terminology is involved.
- Terminology must be used correctly and consistently by the **author** and **sender** of the information.
- Terminology must be known and understood by the **reader** and **recipient** of the information.

**Communication**

- **Communication**: transfer of knowledge and information (in a subject field).
- In most cases via **language** (written, spoken).
- But also via symbols, icons, figures, photographs, videos.
- And colours, gestures.

**Terminological triangle**

- Concept
- Term designation
- Object

**Lexicographical model / entry**

- Word
- Meaning
- Meaning
- Meaning
Terminological model / entry

Descriptive terminology management

K.-D. Schmitz, IIM, FH Köln

tcworld Roadshow Helsinki 2009

Lexicographical entry

Catalyst (disambiguation)

K.-D. Schmitz, IIM, FH Köln

Terminological entry

Communication can be disturbed

Synonymy

K.-D. Schmitz, IIM, FH Köln

Prof. Dr. Klaus-Dirk Schmitz
FH Köln, Fakultät 03/IIM
Communication can fail

- Homonymy / Polysemy

Terminology standardization

- the selection and creation of appropriate terminology as well as the consistent and correct usage of terms are fundamental pre-conditions for the creation, development and dissemination of information and knowledge
- Good terminology does not only help the user/recipient of the information; it also assists and supports the localization and translation process

Terminology standardization

- terminology should be defined and used consistently:
  - within a document
  - within a product
  - within a company
- only one term for a given concept (no synonyms!)
- only one concept behind a given term (no homonyms!)

Standardization (international)

- ISO/TC37 „Terminology and other language and content resources“
  - SC 1: Principles and methods
  - SC 2: Terminographical and lexicographical working methods
  - SC 3: Systems to manage terminology, knowledge and content
  - SC 4: Language resource management

Standardization (other)

- National standardization: for specific national needs or ISO localization
- European standardization: no standardization of terminological principles and methods until now
- standardization among enterprises: e.g. LISA (TMX, TBX), KÜDES (recommendation)
- standardization within an enterprise: e.g. terminology guidelines, style guides

Terminology solutions in enterprises: benefits from standardization

- basic principles and methods
  - ISO 704: Terminology work - Principles and methods
  - ISO 1087: Terminology work - Vocabulary
  - DIN 2330: Begriffe und Benennungen - Allgemeine Grundsätze
  - DIN 2342: Begriffe der Terminologielehre - Grundbegriffe
- concept orientation + term autonomy
Terminology solutions in enterprises: benefits from standardization

- working procedures
  - ISO 26162: Systems to manage terminology, knowledge and content - Design, implementation and maintenance of terminology management systems (DIS)
  - guidelines for terminology management/ work

- IT-realization: design
  - ISO 12200: Computer applications in terminology - Machine-readable terminology interchange format (MARTIF) - Negotiated interchange
  - ISO 16642: Computer applications in terminology - Terminological markup framework (TMF)
  - ISO 26162: Systems to manage terminology, knowledge and content - Design, implementation and maintenance of terminology management systems (DIS)
  - data modeling + meta-model

Terminology solutions in enterprises: benefits from standardization

- IT-realization: data categories
  - ISO 12620: Computer applications in terminology - Data categories (1999, but new as DIS)

- IT-realization: data interchange
  - ISO 12200: MARTIF
  - ISO 16642: TMF
  - ISO 30042: Systems to manage terminology, knowledge and content -- TermBase eXchange (TBX)

Terminology solutions in enterprises: benefits from standardization

- IT-realization: data categories
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- IT-realization: data interchange
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Concept orientation

- All terminological information belonging to one concept including all terms in all languages and all term-related and administrative data must be stored in one terminological entry

concept = terminological entry
Term autonomy

- All terms belonging to one concept should be managed (in one terminological entry) as autonomous (repeatable) blocks of data categories without any preference for a specific term
- Therefore all terms can be documented with the relevant term-related data categories
- Term autonomy is necessary for the main term, all synonyms, all variants, and all short forms
- Also deprecated terms (no-terms) should follow term autonomy (marked with &lt;do not use&gt;)

Concept orientation & term autonomy

Terminology solutions in enterprises: benefits from standardization
ISO 12620: inventory of more than 200 data categories for terminological data collections:
- A.1 term
- A.2 term-related information
- A.3 equivalence
- A.4 subject field
- A.5 concept-related description
- A.6 concept relation
- A.7 conceptual structures
- A.8 note
- A.9 documentary language
- A.10 administrative information
- Annex B (inform.): bibliographical data categories under review, no structuring and subdivision!

Terminology solutions in enterprises: benefits from standardization

Terminology in enterprises

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Construction
- Project Planning
- Project Management
- Quality Assurance
- Terminology Management
- Production
- Technical Writing
- Translation

Terminology improvement ≈ Product shipping

Terminology in enterprises

- Information development and localization workflow

"simple" workflow, no Δ, but late LION

Terminology in enterprises

- Information development and localization workflow

"complex" workflow, big Δ, LION as "simship"
⇒ terminology is needed very early!

Reference: Sue Ellen Wright 2000

Reference: Matthias Heyn, Trados, DTT-Symposium 2004

"information development and localization workflow"

"information development"

"translation / localization"

"simple" workflow, no Δ, but late LION

"complex" workflow, big Δ, LION as "simship"⇒ terminology is needed very early!

Reference: Sue Ellen Wright 2006

Terminology for software localization

- Traditional Process:
  - Ad hoc TMM
  - Reactive project-specific TMM
  - No influence on document production, i18n

Workflow diagram ©Keiran Dunne 2005
Sue Ellen Wright 2006
Terminology for software localization

- TMM as a function of QA (Quality Assurance) management
- TMM and QA upstreamed to planning stage
- Proactive TMM

Workflow diagram ©Keiran Dunne 2005
Sue Ellen Wright 2006

Terminology in enterprises

- Bei einem Webinar zum Thema Terminologie, an dem über 500 Personen teilnahmen, wurde folgende Frage gestellt: Bereitet Ihnen die Verwaltung von Terminologie derzeit Probleme?

Terminology in enterprises

- Wie wird Terminologie in Ihrem Unternehmen verwaltet?

Medtronic Terminology Workflow

K.-D. Schmitz, IIM, FH Köln

Sophie Hurst – SDL – 2008
Terminology management is a basic requirement for corporate communication!
Terminology management supports technical communication and translation processes!

**BUT WHY is it so difficult to convince decision makers to invest in terminology management?**

**Why do initiatives fail?**

- Operations & CFO: different mindset
  - Corporate image, customer satisfaction, improved communication
  - What is the ROI in 1-3 years?
  - How much does it cost?
  - It sounds good

**Costs and ROI**

- modification of a term using "single-source-publishing"
  - "Fastened by a steel 3-1/2" threaded bolt"
  - "Fastened by an aluminum 3-1/2" threaded bolt"

**Costs and ROI**

- ebXML
- cXML
- CD-ROM

**Costs and ROI**

- ebXML
- cXML
- CD-ROM
example for cost calculation:

Ben Martin (JD Edwards, TAMA2001)
- average costs to correct one term throughout all documents: 1,900.00 US $ per language
- average costs to create one terminological entry: 150.00 US $

Identified metrics
- Time spent on terminology-related matters
- Collection of information for a month

Analysis of the Results
- Translation: 5%, Review: 25%
- Help Desk: 5%
- Technical writing: 3%
- Training Department: 2%
- Corporate Information Services: 2%
- SW/Web Development: >1%
- Legal Department: <1%
- Financial Department: <1%

10 technical writers at $80/hour each spending 5 hours less/month on terminology research = $48 000
20 engineers at $80/hour each spending 2 hours less/month on terminology research = $38 400
Initial setup costs $63 500 (3 years) = $21 200
Fixed costs (maintenance, sw updates) = $10 000
Average profit margin = 50 %

[(Profit - Investment)/Investment]*100

[(43 200 – 31 200)/ 31 200] * 100 = 38.5 %
ROI = 38.5 %

Conclusion I
- terminology solutions in enterprises, taking into consideration all aspects of terminology theory and terminology management,
- reduces efforts and costs for translation and localization
- brings products faster to the market
- supports user friendliness and user acceptance of products and documentation, also in the local market
- (supports non-native speakers)
High-quality terminology work is time-consuming and therefore expensive.

The more persons or applications make use of the terminology, the better the benefit.

The “earlier” terminology work starts, the more efficient will be the process of software development and software localization. product liability, user satisfaction, time to market, etc.

Only a proactive and multi-disciplinary terminology approach will really help.

proactive: when concepts are created and named

multi-disciplinary: programmers, interface designers, technical writers, web designers, marketing experts, hotline people, localizers etc.

Thank you for your attention

Prof. Dr. Klaus-Dirk Schmitz
Fachhochschule Köln
Fakultät 03 - ITMK/IIM
Mainzer Str. 5
D-50678 Köln
klaus.schmitz@fh-koeln.de