

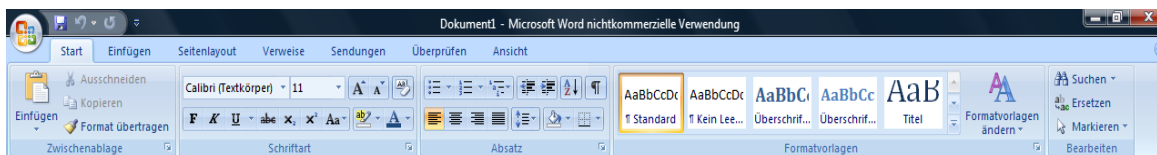
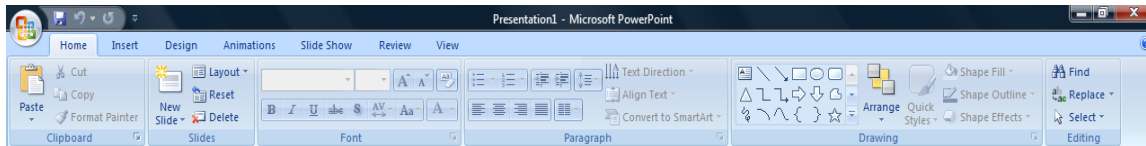
Introduction to Terminology Part 2

Klaus-Dirk Schmitz
Cologne University of Applied Sciences

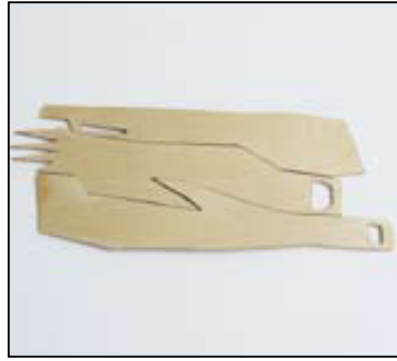
Overview

- **Terms**
 - **Coining new terms**
 - **Selecting good terms**
- **Characteristics**
- **Intension and extension**
- **Definitions**
- **Working methods**

Coining new terms



Coining new terms



- **Freiraum-Utensilien**
- **Multifunktionsbesteck**

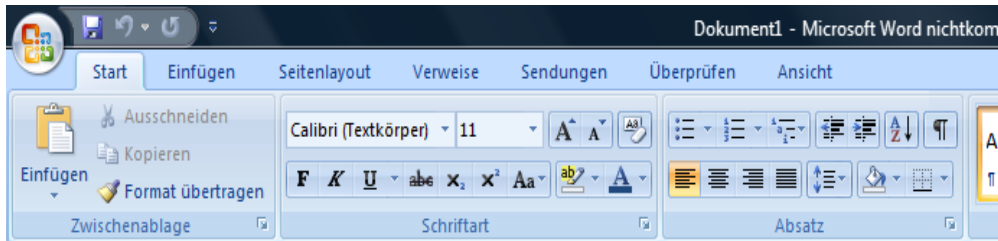
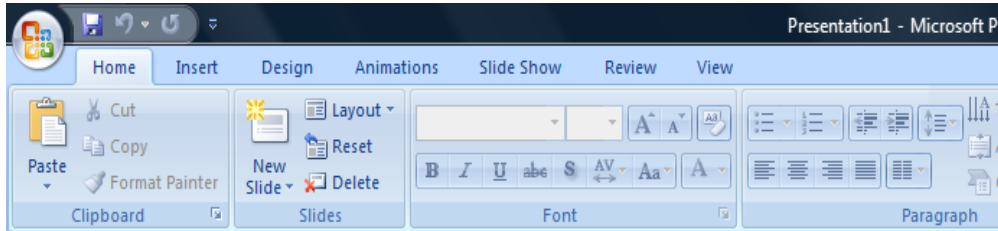
Coining new terms



- **Segway Personal Transporter**
- **Segway PT**
- **Selbstbalance-Roller**
- **Gyropode (fr)**



Coining new terms



ribbon

- Ribbon
- Band
- Multifunktionsleiste
- ruban (FR)

A screenshot of a PowerPoint help window titled "PowerPoint-Hilfe". The window has a search bar and a "Suchen" button. The main content area displays the title "Verwenden der Multifunktionsleiste" (Using the Multifunctional Ribbon). Below the title, there is a sub-header "PowerPoint > Neuigkeiten" and a button "Alle anzeigen". The main text reads: "Wenn Sie zum ersten Mal einige der Programme in 2007 Microsoft Office System starten, überrascht Sie möglicherweise, was Sie sehen. Die Menüs und Symbolleisten in einigen Programmen wurden durch die Multifunktionsleiste ersetzt." At the bottom of the window, there is a status bar with "PowerPoint-Hilfe" and "Offline".

PowerPoint-Hilfe

Ribbon

Suchen

PowerPoint > Neuigkeiten

Verwenden der Multifunktionsleiste

Alle anzeigen

Wenn Sie zum ersten Mal einige der Programme in 2007 Microsoft Office System starten, überrascht Sie möglicherweise, was Sie sehen. Die Menüs und Symbolleisten in einigen Programmen wurden durch die Multifunktionsleiste ersetzt.

An inset screenshot of a PowerPoint ribbon, specifically the "Einfügen" (Insert) tab. A red circle highlights the font section, which includes the font name "Calibri", font size "11", and various font formatting icons like bold, italic, underline, and text color.

Schreiben Einfügen Seitenlayout Ven

+Textkörper (Calibr 11

B I U abc x₂ x² fAa

Schriftart

PowerPoint-Hilfe Offline

Coining new terms

- **Coining of new terms:**
word formation + term building mechanisms
(language dependant)
 - **Composition:** *cyberspace*, *translation memory system*
 - **Derivation:** *preface*, *management*
 - **Conversion:** *the chair* → *to chair*, *green (adj)* → *the green*
 - **Terminologization:** *mouse (IT)* ← *mouse (bio, general)*,
virus (IT) ← *virus (med)*
 - **Loan word:** *festschrift*, *zeitgeist* from DE, *rickshaw* from JP
 - **Abbreviation:** *CEO*, *AIDS*, *scuba*, *Interpol*
 - **New creation:** *blurb*, *quark* (very rare)

Selecting “good” terms



- **USB flash drive**
- **flash drive**
- **USB stick**
- **USB memory key**
- **memory stick**

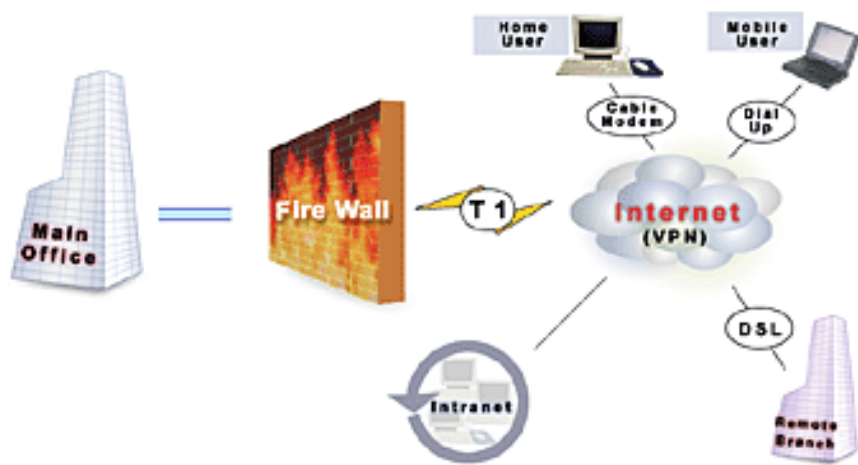
- **keydrive**
- **pendrive**
- **thumbdrive**
- **jumpdrive**
- **etc.**

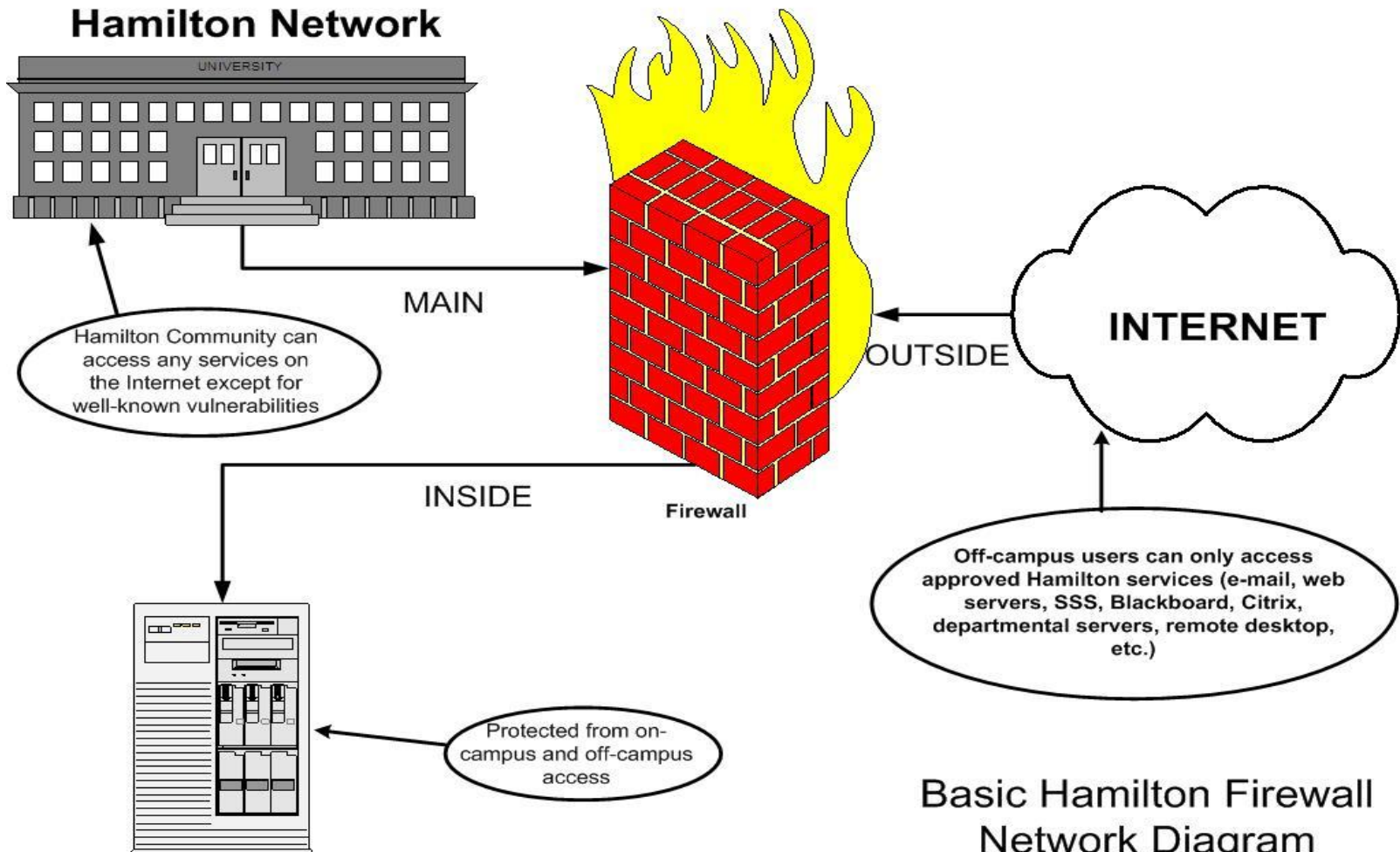
Selecting “good” terms

- **Criteria for the selection and creation/coining of terms (ISO 704):**
 - Transparency/motivation
 - Consistency
 - Appropriateness
 - Linguistic economy
 - Derivability
 - Linguistic correctness
 - Preference for native language
 - ...

Transparency

- The concept designated by the term can be inferred without a definition
- The meaning of the term is visible by:
 - morphological motivation
page setup, error message
*data network identification code**
*network printing device setup**
 - semantic motivation
mouse, worm, virus, infected file, vulnerability
*firewall**
 - **torque wrench vs. monkey wrench**





Hamilton Network

UNIVERSITY

MAIN

Hamilton Community can access any services on the Internet except for well-known vulnerabilities

Firewall

OUTSIDE

INTERNET

INSIDE

Off-campus users can only access approved Hamilton services (e-mail, web servers, SSS, Blackboard, Citrix, departmental servers, remote desktop, etc.)

Protected from on-campus and off-campus access

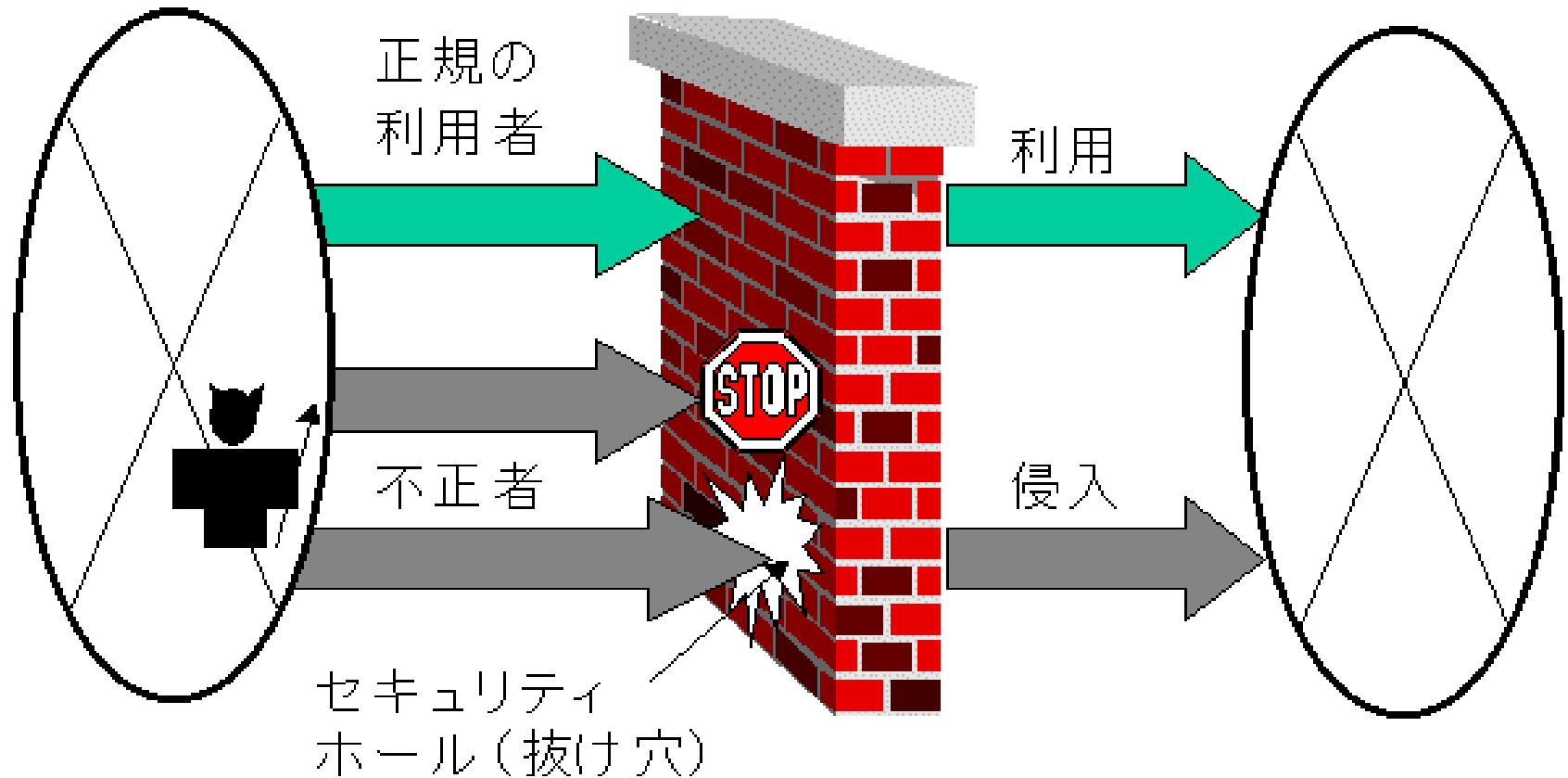
Datatel Server

Basic Hamilton Firewall Network Diagram
January, 2004

社外ネット

ファイアウォール

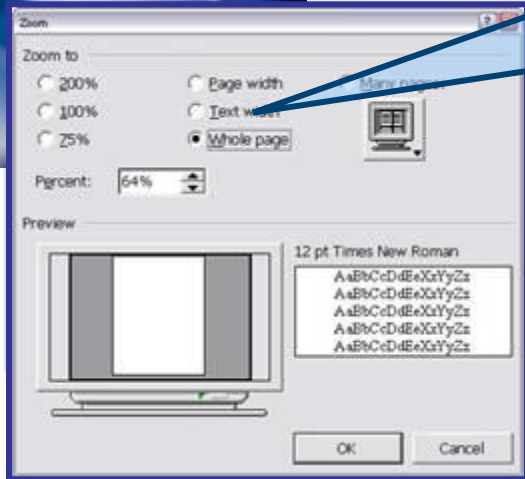
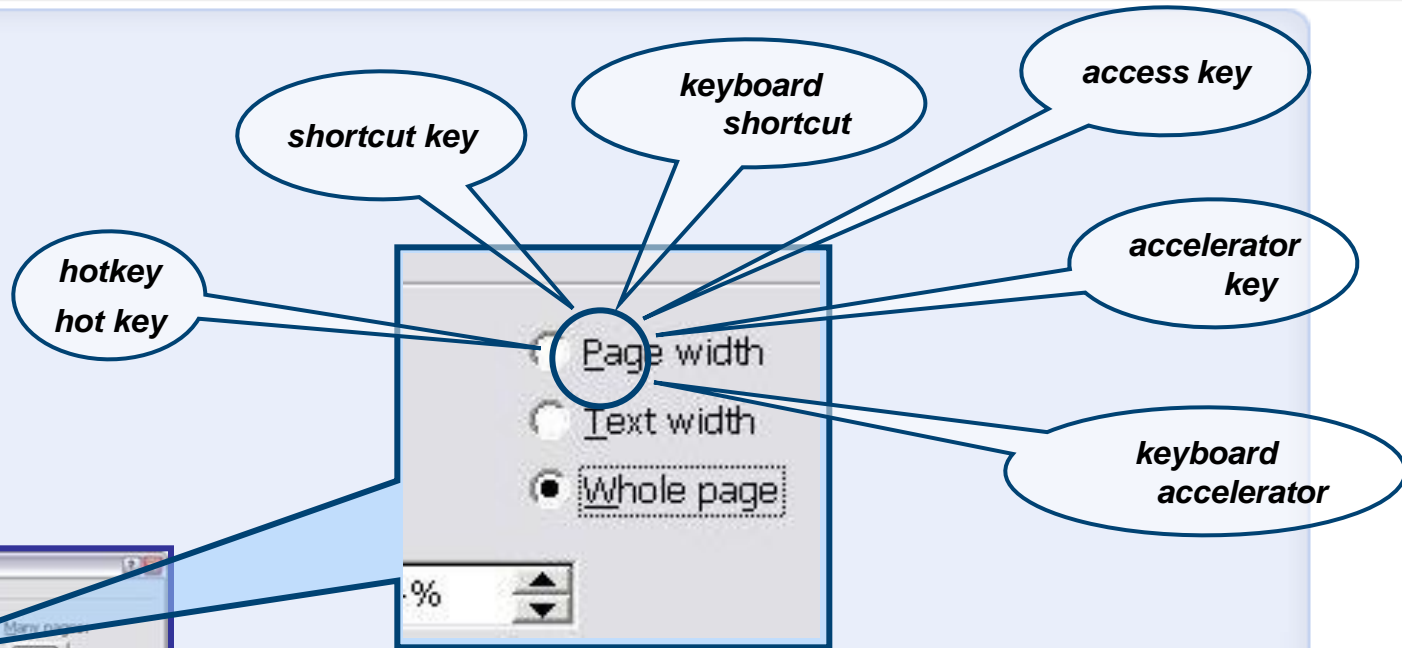
社内システム



Consistency

- The terms of one domain / concept system are coined consistently using the same motivation (characteristics) and the same word formation mechanisms:
 - *nylon, orlon, dracon, ... -on*
 - *VP of Finance, VP of Marketing, VP of Production, ...*
 - **NOT:** *spark plug wrench, open-end wrench, adjustable wrench, monkey wrench, Allen wrench, alligator wrench, ...*

Consistency: Standardizing terminology



**Matthias Heyn, SDL,
tekom-Jahrestagung 2005**

Consistency: Standardizing terminology

Begriffsnummer: 127

Begriffsklärung:

Benennung: Leichtmetallscheibenrad

Synonyme: Leichtmetallrad
Alufelge
Aluminiumscheibenrad
Aluminium-Scheibenrad
Leichtmetall-Scheibenrad
Scheibenrad Aluminium



Reference: Susanne Göpferich, DAISY-Projekt, DTT-Symposion 2004

Consistency: Standardizing terminology

Rec. No.
Record No.
Rec.-No.
Rec #
Rec No.
Rec. No.:
Rec. Number
Rec. Number:

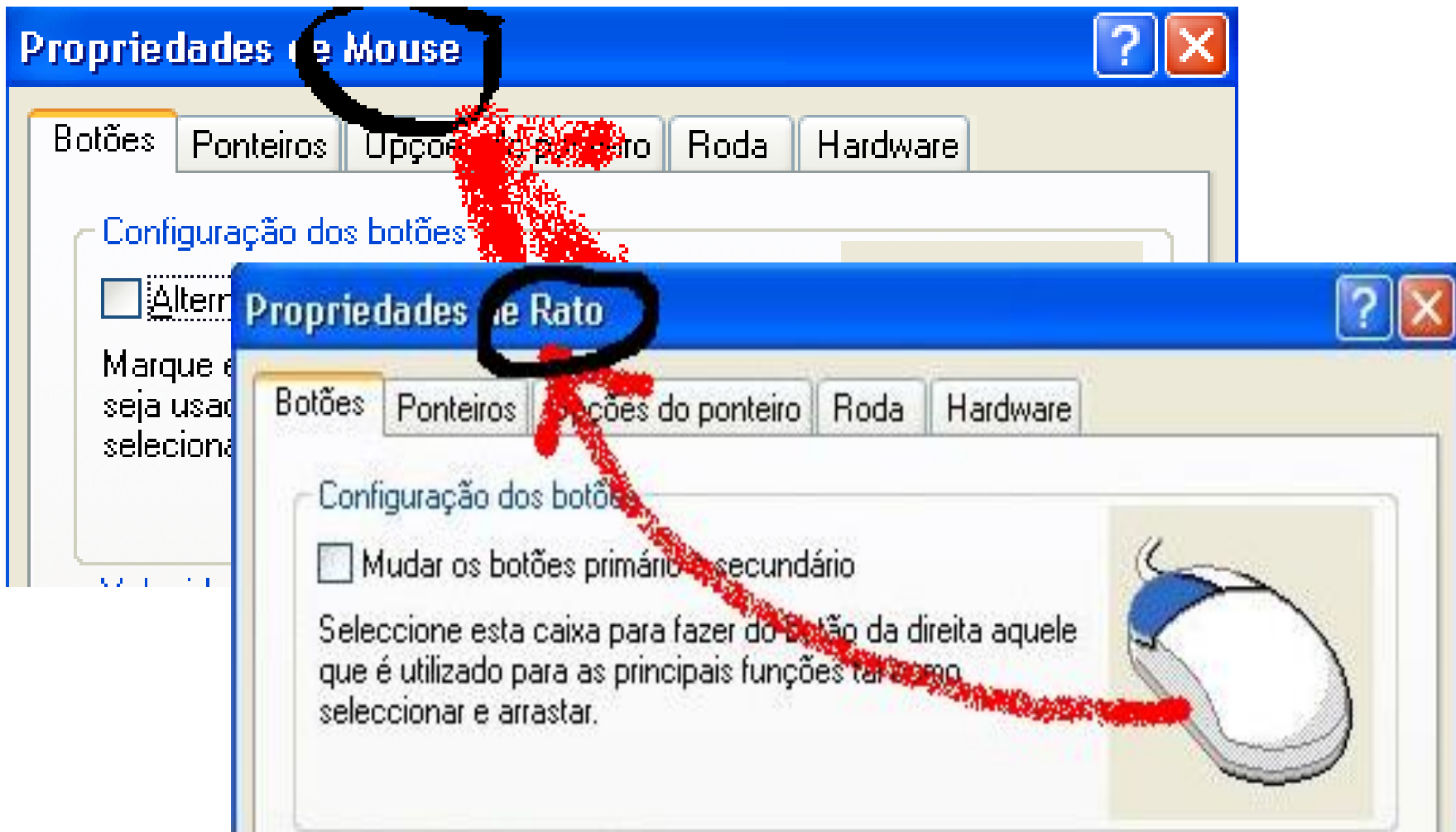


Record number

Appropriateness

- **Appropriateness means that terms:**
 - have to be familiar to the user (localization!)
 - don't cause confusion or insecurity
 - have no negative connotations (neutral, politically correct)
 - *express installation (only components needed)*
network installation (all components)
 - *system error, severe error, fatal error, user error etc.*
 - *master/slave, web designers' bible, knowledge nugget etc.*
 - *nuclear energy vs. atomic energy*
genetic engineering vs. genetic manipulation

Appropriateness



Appropriateness



Other criteria

- **Linguistic economy**
 - *term bank vs. terminological data bank*
 - *Ultrakurzwellenüberreichweitenfernsehrichtfunkverbindung*
- **Derivability**
 - *medicinal plant vs. herb --> herbal, herbalist, ...*
- **Linguistic correctness**
 - *aktualisieren vs. updaten, geupdated, upgedatet, ...*
- **Preference for native language**
 - *Startseite vs. Homepage*
- **Uniqueness (don't create homonyms in one domain !)**

Term-related issues for termbases

Terms should be entered in canonical form:

- normally in lowercase (but: *Drucker, Microsoft*)
- nouns normally in singular (pl: *trousers, Leute*)
- verbs normally in infinite form
- multi-word terms in spoken/written order
- nouns not with articles (*der, le*)
- verbs not with infinite particles (*to, à, zu*)
- spelled correctly

Characteristics

- **Characteristic:**
abstraction of a property of an object or of a set of objects

Characteristics are used for describing concepts!

- **Concepts** have **characteristics**
- **Objects** have **properties**

Concept: abstraction based on the set of all mechanical mice

Designation (term): mechanical mouse

Properties of <i>Object 1</i>	Properties of <i>Object 2</i>	Properties of <i>Object 3</i>	<i>Characteristics</i>
hand-manoevred along a firm, flat surface	hand-manoevred along a firm, flat surface	hand-manoevred along a firm, flat surface	<u>being hand-manoevred along a firm, flat surface</u>
has a ball on its underside	has a ball on its underside	has a ball on its underside	<u>having a ball on its underside</u>
has three buttons	has two buttons	has three buttons	<u>having at least one button</u>
has a wire for connecting to a computer	has a wire for connecting to a computer	has a wire for connecting to a computer	<u>having a wire for connecting to a computer</u>
rollers detect the movement of the ball	rollers detect the movement of the ball;	rollers detect the movement of the ball	<u>having rollers (mechanical sensors) for detecting ball-movement</u>
ivory-coloured	blue <div style="border: 1px solid black; padding: 5px; width: fit-content; margin: 10px auto;">ISO 704:2009</div>	black	<u>having colour</u> NOTE This <i>characteristic</i> is inherited from a <i>superordinate concept</i> at a very high level, e.g. 'physical object'.

Characteristics

- **Essential characteristic:**
characteristic which is indispensable to understanding a concept
- **Delimiting characteristic:**
essential characteristic used for distinguishing a concept from related concepts
- The delimiting characteristic **support for the back** may be used for distinguishing the concepts *stool* and *chair*.

Characteristics

- **Characteristics shall be used for:**
 - **the analysis of concepts**
 - **the modeling of concept systems**
 - **the formulation of definitions**
 - **the selection and formation of terms**
(where appropriate)
 - **the comparison of concepts**
(find out about synonymy and equivalence)

Intension & Extension

- **Intension**

set of characteristics which makes up the concept

Lorry: vehicle, motor-powered, steering mechanism, for transportation of goods

- **Extension**

totality of objects to which a concept corresponds

Scandinavian countries: Denmark, Norway, Sweden

DIN: Begriffsinhalt, Begriffsumfang, Begriffsbestand

Definition

- representation of a concept by a descriptive statement which serves to differentiate it from related concepts

For terminology work, concepts are essential. But concepts are mental representations. Definitions are used to make the concept “visible”.

Definition

- **intensional definition**

definition which describes the intension of a concept by stating the superordinate concept and the delimiting characteristics

incandescent lamp: electric lamp in which a filament is heated by an electric current in such a way that it emits light

- **extensional definition**

description of a concept by enumerating all of its subordinate concepts under one criterion of subdivision

noble gas: helium, neon, argon, krypton, xenon, radon.

Deficient definitions

- **circular definition**

evergreen tree:

NO tree with evergreen foliage

YES tree that has green leaves throughout the entire

- Can be circular within one definition or between two definition
- Sometimes called tautological definition
- BUT: motivated transparent terms !

Deficient definitions

- **inaccurate definition**
optomechanical mouse:

NO, too broad:

computer mouse that uses a ball to control the pointer on the computer screen

NO, too narrow:

computer mouse composed of a mouse button, rubber ball, circuit board, cord, x- and y-axis rollers, LED infrared emitter, and infrared sensor

YES, correct:

computer mouse composed of a mouse button, ball, circuit board, cord, x- and y-axis rollers, infrared emitter, and infrared sensor

Deficient definitions

- **negative definition**

deciduous tree:

NO: tree other than an evergreen tree

YES: tree that loses its foliage seasonally

But (“negative” concepts):

nonconformity:

non-fulfilment of a specified requirement

baldness:

having no hair on the head

Definition-related issues

- **Try to provide just one good definition (see 704)**
(Multiple definitions can be confusing)
- **Try to find and enter existing definitions**
(with the source); **shortenings and extensions**
are sometimes necessary and helpful
- **Definitions should be as short as possible**
and as long as necessary
- **Stating a synonym is not a definition!**
e.g. diaphragm spring = Belleville spring

Definition-related issues

- **Use terms for referenced concepts and characteristics consistently**
- **If the term is mentioned in the definition, try to use it in singular form**
- **Definitions do not exist for ever: concepts are changing; therefore check and update**
- **Test definitions by inversion**
- **Definition should be written in a way that the statement can replace the term in a text**

Definition-related issues

If you have to write you own definition:

- **state what kind of thing your concept represents (usually the broader concept) and mention what differentiates your concept from other closely related concepts (intensional definition)**
- **let a domain expert check the definition**
- **do not use finite verbs like *is, refers to, is called***
- **do not mention the term in the definition (DE !)**
- **punctuation, capitalization, article usage: provide styleguides**

Definition-related issues

- **Example:**

Term: *terminography*

Term: *terminology management*

Def: *part of terminology work concerned with the recording and presentation of terminological data*

Ref: *ISO 1087-1:2000*

Note: *Terminological data may be presented in the form of term banks, glossaries, thesauri or other publications.*

Terminology working methods I

- **ad hoc terminology work**
solving a current terminological problem
(research for unknown terms, equivalents, synonyms)
- **text-oriented terminology work**
preparatory terminology research for a given text
(solve all terminological problems before you translate)
- **domain-oriented terminology work**
terminology research for all concepts of a given
subject field
(elaborate a complete terminology with concept relations)

Terminology working methods II

- **descriptive terminology work**
determine and describe the (current) usage of concepts, terms and definitions
(typical for freelance translators, interpreters, techwriters)
- **prescriptive (normative) terminology work**
lay down and define concepts, terms and equivalents, classify them as preferred, admitted and deprecated
(typical for standards bodies, but also for companies etc.)

Thank you for your attention

Prof. Dr. Klaus-Dirk Schmitz

Fachhochschule Köln
Fakultät 03 - ITMK/IIM

Mainzer Str. 5
50678 Köln

klaus.schmitz@fh-koeln.de

