INTERNATIONAL CLASSIFICATION OF ASSISTIVE PRODUCTS AND SERVICES

Natasha Layton, Yvonne Heerkens, Takenobu Inoue
on behalf of TC173/SC2/WG12
Assistive products (AP) and AP services enable activities of daily life & participation in society
Greetings from TC173/SC2/WG12

• WG12 – ISO 9999 Assistive Products for Persons with Disability – Classification and Terminology
• Evidence demonstrates that assistive products require a range of assistive services to ensure their effective use
• Assistive Product (AP) services are also termed soft technologies or clinical / professional services
• This paper considers the role of ISO in developing standards for AP services
MATCHING PERSON & ENVIRONMENT & OCCUPATION?

- Information / initiation
- Assessment,
- Identify & trial assistive solutions within environments of use
- Purchase
- Customise
- Maintenance
- Review
What reference documents are available to us?

WHO ICF describes the **functioning** and **goals** of AT users

WHO ICF Environmental factors and ISO 9999 describe **characteristics** of products

WHO ICHI is a tool for reporting and analysing **health interventions**
WHO ICF describes (problems in) **functioning** and **goals** of users

WHO ICF Environmental factors and ISO 9999 describe **characteristics** of assistive products
Harmonization of terminology of assistive products
one-level classes of ISO 9999 with Chapter 1 of list of environmental factors of ICF
Definition of assistive product*

Any product (including devices, equipment, instruments and software) especially produced or generally available, used by or for persons with disability

- for participation
- to protect, support, train, measure or substitute for body functions/structures and activities
- to prevent impairments, activity limitations and participation restrictions
ISO 9999 (2016) – 12 classes

<table>
<thead>
<tr>
<th>Class</th>
<th>Description</th>
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<tbody>
<tr>
<td>04</td>
<td>Assistive products for measuring, supporting, training or replacing body functions</td>
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<tr>
<td>05</td>
<td>Assistive products for education and for training in skills</td>
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<tr>
<td>06</td>
<td>Assistive products attached to the body for supporting neuromusculoskeletal or movement related functions (orthoses) and replacing anatomical structures (prostheses)</td>
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<td>09</td>
<td>Assistive products for selfcare activities and participation in selfcare</td>
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<td>12</td>
<td>Assistive products for activities and participation relating to personal mobility and transportation</td>
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<tr>
<td>15</td>
<td>Assistive products for domestic activities and participation in domestic life</td>
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<tr>
<td>18</td>
<td>Furnishings, fixtures and other assistive products for supporting activities in the indoor and outdoor human-made environment</td>
</tr>
<tr>
<td>22</td>
<td>Assistive products for communication and information management</td>
</tr>
<tr>
<td>24</td>
<td>Assistive products for controlling, carrying, moving and handling objects and devices</td>
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<tr>
<td>27</td>
<td>Assistive products for controlling, adapting or measuring elements of the physical environment</td>
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<td>28</td>
<td>Assistive products for work activities and participation in employment</td>
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<td>30</td>
<td>Assistive products for recreation and leisure</td>
</tr>
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</table>
An example of classifying an assistive product

22 ASSISTIVE PRODUCTS FOR COMMUNICATION AND INFORMATION MANAGEMENT

22 30 Assistive products for reading

22 30 21 Character-reading machines
Devices for reading and transforming written text into alternative forms of visual, auditory and tactile communication

(optional 4\textsuperscript{th} level for nations to create finer categories)
Linking AP to activities, & participation outcomes

Self-care

Safety when travelling
GPS for location

Interpersonal interaction & relationship

Communicate without tactile interpreter
SMS communication

Domestic life

Learning & applying knowledge

Barcode reader
Colour recognition when shopping

Communication

Notetaker
Diary
Calendar
Facebook
Call Video-relay

Learning

Shopping lists, Timetabling
Manage carer roster
Read invoices and pay bills

Major life areas (education, economic)

Community, social, civic life (cultural; recreation; spiritual; political)

General tasks & demands

Mobility

Photograph surroundings
OCR software

Internet banking
Download books
Online learning

Church services

News via internet
Coding with ISO/ICF is not sufficient to ensure good outcomes
Is this ‘tacit’ or ‘professional’ knowledge?

How are AP services currently defined or described?
Discipline-specific service descriptors

eg. Canadian Practice Process Framework
Polatajko et al (2007)
EG Wheelchairs
- WHO Guidelines
- ISPO documents
- PMG resources
A health intervention is an act performed for, with or on behalf of a person or a population whose purpose is to assess, improve, maintain, promote or modify health, functioning or health conditions.

- Target — the entity on which the Action is carried out
- Action — the deed done by an actor to the Target
- Means — the processes and methods by which the Action is carried out

http://www.who.int/classifications/ichi/en/
**WHO ICHI**

**Interventions on the Environment, products and technology**

- Assessment of products and technology
- Installation of external device
- Change of external device
- Training in the use of products and technology
- Deconditioning from external device
- Education about products and technology
- Advising about products and technology
- Provision of products and technology
- Manufacturing of external device
- Management of external device
- Removal of external device
- Prescription of external device, not elsewhere classified

**Interventions on Activities and Participation Domains: EG Mobility**

- Assessment of changing and maintaining body position
- Test of changing and maintaining body position
- Observation of changing and maintaining body position
- Training in changing and maintaining body position
- Education about changing and maintaining body position
- Performing the task of changing and maintaining body position
- Practical support with changing and maintaining body position
- Emotional support to changing and maintaining body position
Dutch extension of the ISO 9999

Detailed set of terms expressing the intended use of products seen from the users perspective

Enough details; more in depth compared to both ISO9999 and ICF
<table>
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<td>- Monitoring</td>
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<td>- Background work</td>
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<td>- Quality management</td>
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AUSTRALIA: good practice steps
ATSM framework
a) Inform
b) Assess
c) Strategize
d) Implement
e) Assure


(RESNA Guidelines)
AN INTERNATIONAL CLASSIFICATION OF ASSISTIVE PRODUCT SERVICES?

Questions and comments!