Quality and quality systems in libraries

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What is meant by „Quality“?

Definitions

- Fitness for purpose
  - The totality of features and characteristics of a product or service that bear on its ability to satisfy stated or implied needs (ISO 8402)
  - Quality is meaningful only in relation to the purpose and end use of the product.
  - Meeting or exceeding customer expectations at a cost that represents value to them.
Quality is not absolute, but depends on the requirements of the specific product or service.

“Fitness for purpose”

“A product of a simple grade may be a very high quality product.”

(P. Brophy)

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Example: Bicycles

For the normal cyclist:
- solidly built,
- durable,
- easy to use,
- cheap

For the racing cyclist:
- extremely strong,
- highest durability,
- light weight,
- may be expensive

"...quality for one person is not necessarily quality for another"

(Brophy)
<table>
<thead>
<tr>
<th>Quality Criteria or Attributes</th>
<th>Example</th>
<th>Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Performance</td>
<td>A library service meets its most basic purpose</td>
<td>Making key information resources available on demand</td>
</tr>
<tr>
<td>Features</td>
<td>Secondary characteristics which add to the service but are beyond the essential core</td>
<td>Alerting services</td>
</tr>
<tr>
<td>Reliability</td>
<td>Consistency of the service’s performance in use</td>
<td>No broken Web links</td>
</tr>
<tr>
<td>Conformance</td>
<td>The service meets the agreed standard</td>
<td>Dublin Core</td>
</tr>
<tr>
<td>Durability</td>
<td>Sustainability of the service over a period of time</td>
<td>Document delivery within 2 days</td>
</tr>
<tr>
<td>Currency</td>
<td>Up-to-dateness of information</td>
<td>OPAC</td>
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## Quality Criteria or Attributes

<table>
<thead>
<tr>
<th>Quality Criteria</th>
<th>Example</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Serviceability</strong></td>
<td>Level of help available to users</td>
<td>Complaint service</td>
</tr>
<tr>
<td><strong>Aesthetics</strong></td>
<td>Visual attractiveness</td>
<td>Physical library, Website</td>
</tr>
<tr>
<td><strong>Usability/Accessibility</strong></td>
<td>Ease of access and use</td>
<td>Opening hours, Website structure</td>
</tr>
<tr>
<td><strong>Assurance/Competence/Credibility</strong></td>
<td>Good experience with staff’s knowledgability</td>
<td>Correct reference answers</td>
</tr>
<tr>
<td><strong>Courtesy/Responsiveness/Empathy</strong></td>
<td>Accessibility, flexibility and friendliness of staff</td>
<td>Reference service</td>
</tr>
<tr>
<td><strong>Communication</strong></td>
<td>Clear explanation of services and options in language free of jargon</td>
<td>Website, sign-posting</td>
</tr>
<tr>
<td><strong>Perceived quality</strong></td>
<td>The user’s view of the service</td>
<td>Satisfaction surveys</td>
</tr>
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</table>

Adapted from Brophy 2004
## Quality Criteria or Attributes

### We might add:

<table>
<thead>
<tr>
<th>Speed</th>
<th>Quick delivery of services</th>
<th>Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Variety of services offered</td>
<td>May clash with quality, if resources are not sufficient for maintaining quality in all services offered</td>
<td>Broad collection, Reference service in walk-in, mail and chat form</td>
</tr>
</tbody>
</table>

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Not all of these issues may be aspects of quality, but they are important for maintaining quality.

- Good working conditions
- Clear planning, straight processes
- High reputation of the library
- Systematic staff development
- Cost-effectiveness
- Clear planning, effective organization
- Positive outcome on users
- Effective cooperation with other institutions
- High reputation of the library
- Access to information worldwide
- Delivery of information to the desktop
- Speed of delivery

Quality: Stakeholder views

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Model of quality management

Definition of mission and goals

- long- and short-time goals
- ressource allocation, activities
- replanning
- control of quality and goals

Quality management
The library orients its range of services consequently according to:

- the needs of its clientele and
- the strategic goals of the institution and
- actively brings the services to the users.

**Mission of academic libraries**

**Procuring information**
- collection
- document delivery
- portals

**Producing information**
- publishing
- archieving
- cataloguing

**Support for teaching and learning**
- workplaces
- support for remote teaching and learning and multimedia
- teaching information literacy

**Management**
- innovative technology
- adequate management methods
- staff development
- cooperation
Performance measures
Criteria for performance indicators

- Integrated view
- "Hybrid" library
- Comparability
- Validity
- Informative content
- **Practicability** (national library statistics)
Effectiveness of offering library services and Efficiency of allocating and using resources for the services

- good
- cheap
Typical indicators for traditional services

- Library visits per capita (of the primary user group)
- Required titles availability
- Document use rate
- Loans per capita
- Shelving accuracy
- Speed of interlibrary lending
Indicators for electronic services

- Number of content units downloaded per capita
- Percentage of information requests submitted electronically
- Workstation use rate
- Percentage of expenditures on information provision spent on the electronic collection
- Costs: - per database session
  - per document downloaded
How to get the data?

Methods

- Library statistics
- Institutional statistics
- Automated library system
- Manual data collection

Data sources:
- Number of visits
- Number of user places
- Number of students
- Number of academic staff
- Number of active users
- ILL requests
- User satisfaction survey
- Number of working-places used

Outcome measures:
- Market penetration
- User satisfaction
- Use rate of working-places

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<table>
<thead>
<tr>
<th>ISO standards</th>
<th>Technical committee 46: Information and documentation</th>
</tr>
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<tr>
<td></td>
<td>Subcommittee 8: Quality, statistics and performance evaluation</td>
</tr>
</tbody>
</table>

### WG 2: International library statistics
  - 3rd revision ongoing

### WG 4: Performance indicators for libraries
  - Amendment 1 (2003)
- Revision / integration ongoing

**Standardization necessary for comparison**
Assessing user / customer needs
### Assessing user needs

#### Satisfaction surveys

<table>
<thead>
<tr>
<th>Method</th>
<th>Advantages</th>
<th>Problems</th>
</tr>
</thead>
<tbody>
<tr>
<td>Print questionnaire in the library</td>
<td>High recall</td>
<td>Only active users</td>
</tr>
<tr>
<td>Questionnaire by mail to a sample of potential users</td>
<td>Non-users are included</td>
<td>Less recall</td>
</tr>
<tr>
<td>Telephone survey</td>
<td>High recall by direct contact</td>
<td>Time-consuming; may be influenced by the interviewer</td>
</tr>
<tr>
<td>Online survey (e.g. in connection with OPAC use)</td>
<td>No distribution needed</td>
<td>Bias on users who frequently use E-services</td>
</tr>
</tbody>
</table>

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Assessing user needs

SERVQUAL model
Adapted to libraries by ARL (Association of Research Libraries) as LibQual
Asking for:
- minimum expectation
- perceived levels
- desired levels
- 240 libraries

http://www.libqual.org

Gaps model

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Assessing user needs: Internal customer

Every library department is the customer of other departments or external suppliers.

Examples
- Subject librarian
- Acquisitions
- Bookseller
- Cataloguing
- Circulation

Internal satisfaction surveys

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Outcome / impact measures

http://www.uni-muenster.de/ULB/outcome
“Outcomes are the results of library use as affecting the individual user.”

Don Revill

“Outcomes are the ways in which library users are changed as a result of their contact with the library’s resources and programs.”

ACRL

“... any effect of a service (or other ‘event’) on an individual or group.”

Peter Brophy
### Information literacy
- **Skills / competences improved after training**: Test
- **Correlation of library teaching attendances to retention rate**: Survey

### Importance of the local library for research
- **Estimation of the importance**: Survey
- **Percentage of citations in publications in the local library collection**: Manual counts / survey

### Financial value of library services
- **Estimation of time saved**: Survey
- **Willingness-to-pay**: Survey

### Academic success
- **Correlation of library services use to success**: Use counts / Success data
- **Correlation of library services use to number/citation of publications**: Use counts / Citation index
Quality management models
Quality assessment system, comprises all procedures relevant for the **product** quality. Criticized for its industrial and technical bias and its product-orientation.

**Issues:**

- Quality manual and procedure manual with documented procedures and goals
- In the beginning of the 90ies, application in libraries
- Special libraries implemented ISO 9000, if their institutions used it
- Medical libraries among the first
- Quality coordinator
- Certification possible
TQM = Total quality management

Quality system trying to change the whole organizational culture
Many issues similar to ISO 9000, again the origin is industry, but the system is more user-oriented

Issues:
- First time right
- Continuous quality improvement (CQI)
- Total commitment of management and staff
- Implementation in libraries in the beginning of the 90ies
- Again: Many special libraries
EFQM (European Foundation for Quality Management) was founded in 1998 by 14 European institutions. Partnership with national organizations. Goal: Sustainable excellence. European Quality Award (EQA). Self-assessment (90 questions). Implemented:
- Public libraries in the Netherlands
- Academic libraries in Andalusia
- CAF (Common Assessment Framework)
EFQM concept

results orientation

impact on society

user orientation

partnerships

leadership, strategy

continuous learning, innovation, improvement

management by processes and facts

staff development and involvement
Systematic use of performance indicators

Sweden

Quality Evaluation Handbook for university libraries
12 indicators

Norway

Set of indicators for all types of libraries
Developed by the Norwegian Archive, Library and Museum Authority

Netherlands

Benchmarking of university libraries
about 36 indicators

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BIX-WB: German Benchmarking Project for Academic Libraries
Balanced scorecard

Original model: 4 perspectives
- Users
- Finances
- Processes
- Learning and development

Adapted perspectives for BIX-WB
- Resources / infrastructure
- Use
- Efficiency
- Development (potentials)
Which infrastructure does the library offer for use?

1. Square metres of user area
2. Library employees
3. Expenditure on literature and information per 1000 members of the population
4. Percentage of that expenditure spent on the electronic collection
5. Opening hours per week

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How are the offered services used?

6. Library visits per capita
   (physical + virtual visits counted separately)

7. Market penetration
   (Percentage of active borrowers in the population)

8. User training attendances per 1000 members of the population

9. Immediate availability
   (Immediate loans as a percentage of total loans including reservations and ILL)

10. User satisfaction rate
    (Identical online survey in all libraries)
Are services offered cost-effectively?

11. Library expenditure per capita (acquisitions, material costs, staff)

12. Ratio of acquisitions expenditure to staff costs

13. Employee productivity (Example: Media processing. Processed media per FTE)
Is sufficient potential available for the necessary developments?

14. Hours of training per staff member

15. Percentage of university budget allocated to the library

16. Percentage of library means received through third-party funds, special funds and income generation

17. Percentage of library staff providing and developing electronic services

http://www.bix-bibliotheksindex.de  EAHIL 2005
How to start: A practical way
Mission and goals must be defined before

- assess user needs (survey)
- use EFQM or SWOT analysis for self-assessment
- use adequate performance indicators
- compare with other libraries (benchmarking)
- define problems, failures, possible improvements
- change processes and resource allocation

now:
start again
Thank you for your patience.

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