

# Resource Description and Access (RDA)

## **Session 3: Conceptual Models underlying RDA**

Dr Akakandelwa & Mr M'kulama Abel C.M




The University of Zambia

Department of library and  
information science (LIS)


Advanced workshop on  
RDA, 2019  
Venue: CBU

Librarians should “read more and watch less”

# FRBR


- FRBR = Functional requirements for bibliographic Record
    - Released 1998 updated 2009
    - Purpose, to users: Find, Identify, Select, Obtain
  - FRAD = Functional requirements for authority data
    - Find, Identify, Contextualise, Justify (why the authority record creator chose the name or the form of name as an access point)
    - Released 2009, amended & corrected 2013
- 

# Purpose, Objective of FRBR

- “The purpose... [of FRBR is] to delineate [represent] in clearly defined terms the functions performed by the bibliographic record with respect to various media, various applications, and various user needs”. ...to cover the full range of functions for the bibliographic record in its widest sense -- i.e., a record that encompasses not only descriptive elements, but access points (name, title, subject, etc.), other "organizing" elements (classification, etc.), and annotations” (1995 Stockholm IFLA seminar).
- 

# Objective of FRBR

to “provide a clear, precisely stated, and commonly shared understanding of what it is that the bibliographic record aims to provide information about, and what it is that we expect the record to achieve in terms of answering user needs.”

- F : find
  - I : Identify
  - S : Select
  - O : Obtain
- 

# Objective of FRBR cont....


- To provide a clearly defined, structured framework for relating the data that are recorded in bibliographic records to the needs of the users
- To recommend a basic level of functionality for records created by national bibliographic agencies

(Fotis Lazarinis, 2015)



# FRBR

**Is an entity relationship model that:**

- relates user tasks of information retrieval (FISO) and access in online catalogues and bibliographic databases
  - concerned with the intellectual concept of the work (e.g. book, video, music, etc)... and its relationship to the copies held in individual libraries
  - focuses on the **convinience** of the user thus considers the best possible way to meet user needs
- 

# FRBR

## 'FRBR[ised]' cataloguing

Cataloguing influenced by FRBR “describes not only the things in our hands, but its **relationship** to other things in the **bibliographic universe**

- not only to its creators, and previous editions, but theoretically to any other things that may be of use to an end user” (Welsh & Batley, 2012)
  - E.G: Animal Farm the book and how it is related to Animal farm the audio book, e-book, translated versions, animal farm the cartoon, etc.
- With FRBR a catalogue should do more than help a user locate an item but **point the user to other options (version, language, format, edition, etc.)**

# FRBR

- FRBR acknowledges that each object a user seeks consists of **content** and **form** and that each of these may be of **interest to users**

## **The Animal farm example**

Content = Story/drama

Form = Text

Form = Audio

Form = Motion picture/Video

- FRBR also recognises that the different versions of an object can, and often do, have complex relationships

**The Animal farm example**

Content = Literature/dram

Form = Text = Book

Form = Audio= Audio Book

Form = Motion picture/Video=Film

\*Thus need for cataloguers to understand FRBR and be able to apply it

# FRBR= an entity relationship model

## What is an ER Model?

- An **abstract representation** of the **universe of things** being described (for cataloguers, information resource, authors, etc. = universe)
- The things in the universe are called: **ENTITIES**
- Entities have characteristics referred to as **ATTRIBUTES**
- Entities also have linkages known as **RELATIONSHIPS**

### Examples of entities:

- Book
- People
- Organisations
- Music Video
- Audio CD

### Examples of Attributes

1. Attributes of a **Book**:  
Author, Title, Date, Publisher, Edition, etc.

2. Attributes of a Person:  
Name, Gender, Date of Birth, ID No.

3. Audio CD attributes:  
Title, Artist, Producer, Date, Price, ect.

# FRBR

ER Model defined...

The **entity-relationship (ER) model** is a prototype for describing in an abstract way the data and their attributes (elements or characteristics) and the relationships among the various classes of data.

- **ER models are usually independent of any physical implementation**

# Conceptual or ER model can be....

- As simple as...

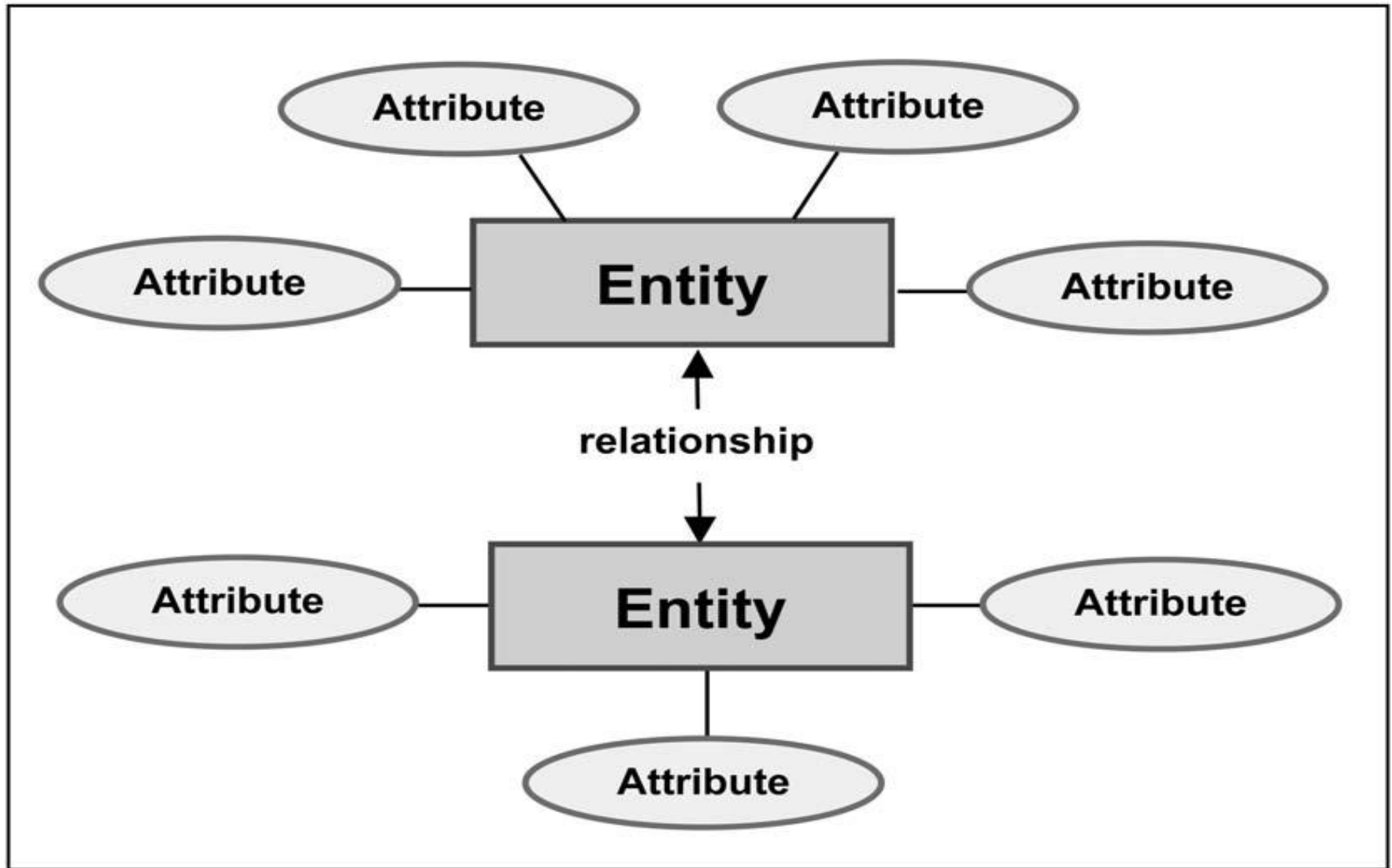


Entity

- Or as complex as...



# ER Model, Example



# ER Model, Example

- **Anima farm-Book**

- Author: George Orwell,
- Date of publication: 1945
- Publisher: 'Harcourt, Brace and Company
- Pagination: 126 pages
- ISBN: 9780451526342

- **Animal farm-movie**

- Director: John Halas and Joy Batchelor.
- Producer: Halas and Batchelor
- Date: 1954
- Place: USA
- Duration: 2hrs
- Based on – book by George Orwell

Both resources are in the information universe as entities:


- They have attributes
- They are also related

# FRBR as an ER Model

**FRBR is based on and is an entity-relationship (ER) model which is...**

- usually **independent** of any physical implementation
- It can therefore be applied to any cataloguing code

# FRBR

- FRBR deals with the content of bibliographic description
    - It models bibliographic data and how it is related
  - FRBR views the bibliographic universe independently of any cataloguing code
  - It can therefore be applied in any cataloguing code
    - AACR2, DUBLIN CORE, RDA, etc.
- 

# Modelling the Bibliographic Universe

**Model** = demonstrate, display, exemplify, etc.

- “FRBR is a **user-centered model**, [that] explicitly relates its organization of **entities and attributes** to the **users tasks** [originally proposed by Cutter] & identified by the 1998 IFLA modification to the Paris Principles

USER TASKS = Find, Identify, Select, & Obtain”



# Modelling the Bibliographic Universe

“**FRBR** remodels the bibliographic universe in a top-down approach, **going from the abstract level of conceptual content** to the lower level concerning the **physical properties** of a bibliographic object.”

- Concepts such as ‘**work**’, ‘**item**’, and ‘**expression**’, which are sometimes used **interchangeably in AACR2** are clarified in **FRBR** and used **accordingly in RDA**.

# FRBRs organisation of the bib universe: the Entities

FRBR defines three groups of entities to express the structure and relationships of bibliographic and authority records:

- **Group 1 entities: Work, Expression, Manifestation, Item (WEMI)**
  - This group consists of the products of intellectual or artistic endeavour that are named or described in bibliographic records.
- **Group 2 entities: Person, Corporate Body**
  - These entities are responsible for the intellectual or artistic content; physical production and dissemination; or the custodianship of such products.
- **Group 3 entities: Concept, Object, Event, Place**
  - Consists of the additional set of entities that serve as the **subjects** of intellectual or artistic endeavour.

## Group 1 Entities

Products of  
intellectual or  
artistic endeavor

Work (W)

Expression (E)

Manifestation (M)

Item (I)

## Group 2 Entities

Those responsible for  
the intellectual/artistic  
content, the physical  
production and  
dissemination,  
or the custodianship  
of Group 1 entities

Person (P)

Family (F)

Corporate body (Cb)

## Group 3 Entities

The subjects of  
intellectual  
or artistic endeavor

Concept (C)

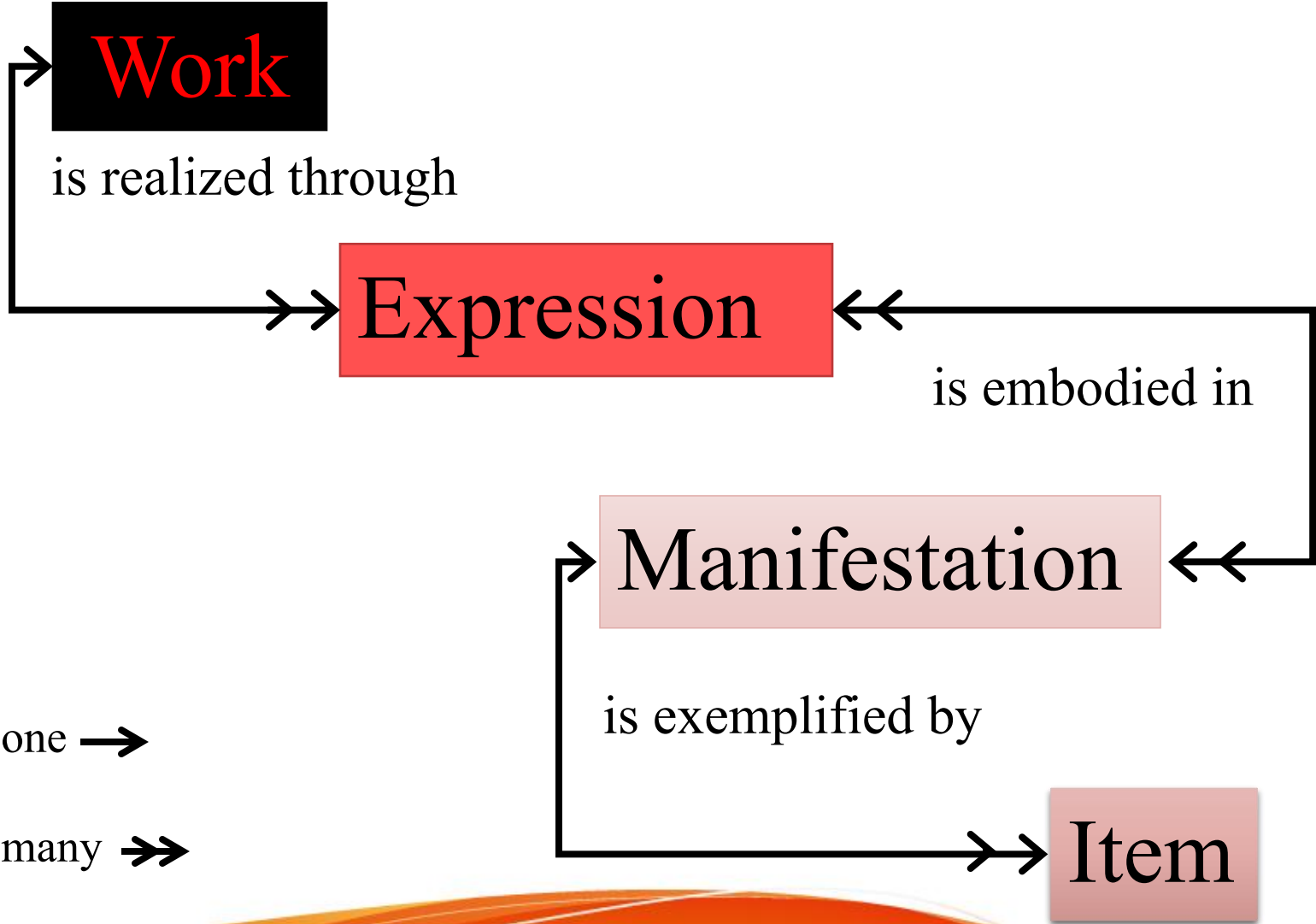
Object (O)

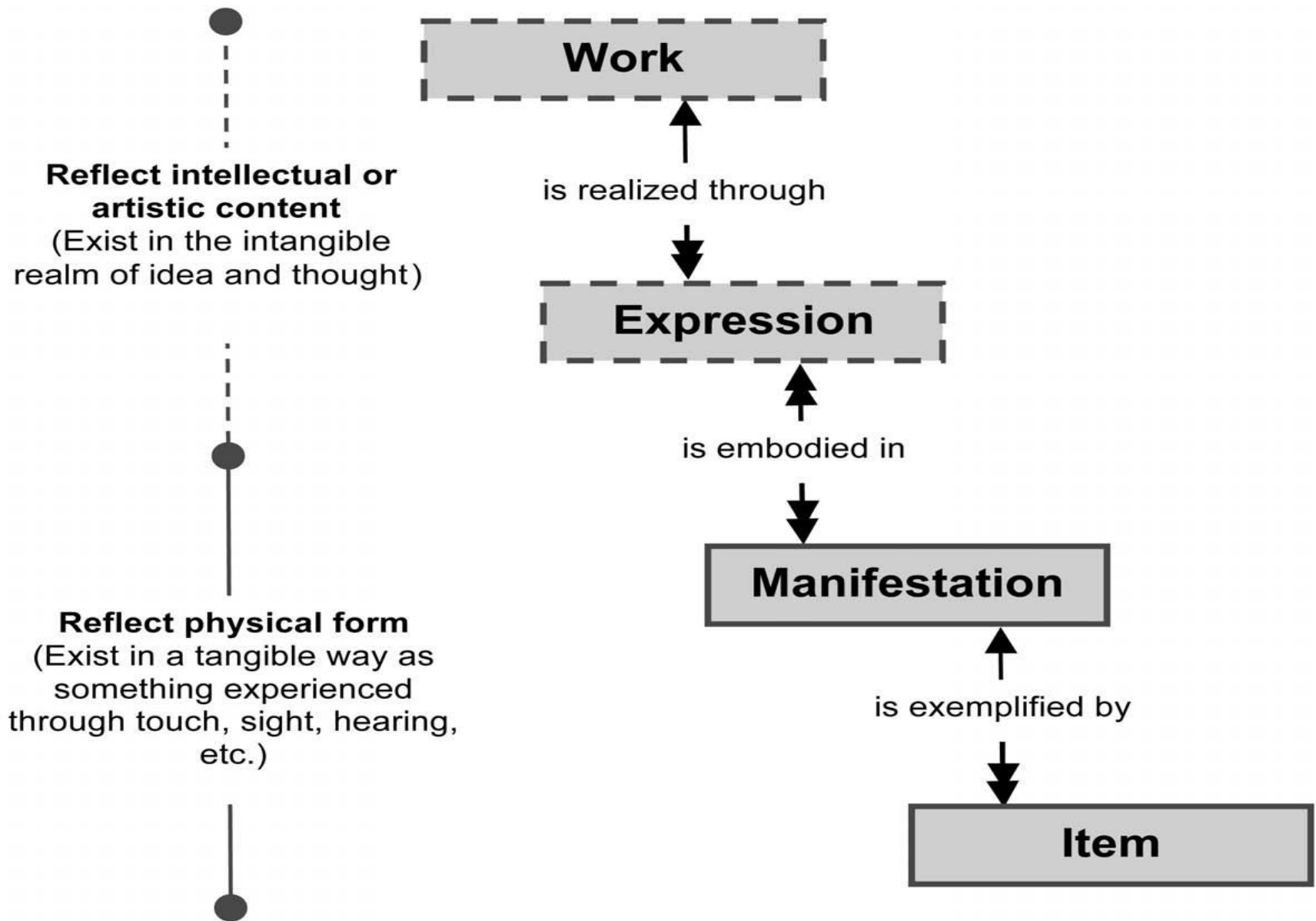
Event (Ev)

Place (Pl)

+ Group 1, Group 2

# Group 1 entities & relationships





Source: Based on FRBR 3.1.1 and Figure 3.1

# Elements to Describe Resources

## □ Work

- ❖ ID
- ❖ Title
- ❖ Date
- ❖ etc.

## □ Expression

- ❖ ID
- ❖ Form
- ❖ Date
- ❖ Language
- ❖ etc.

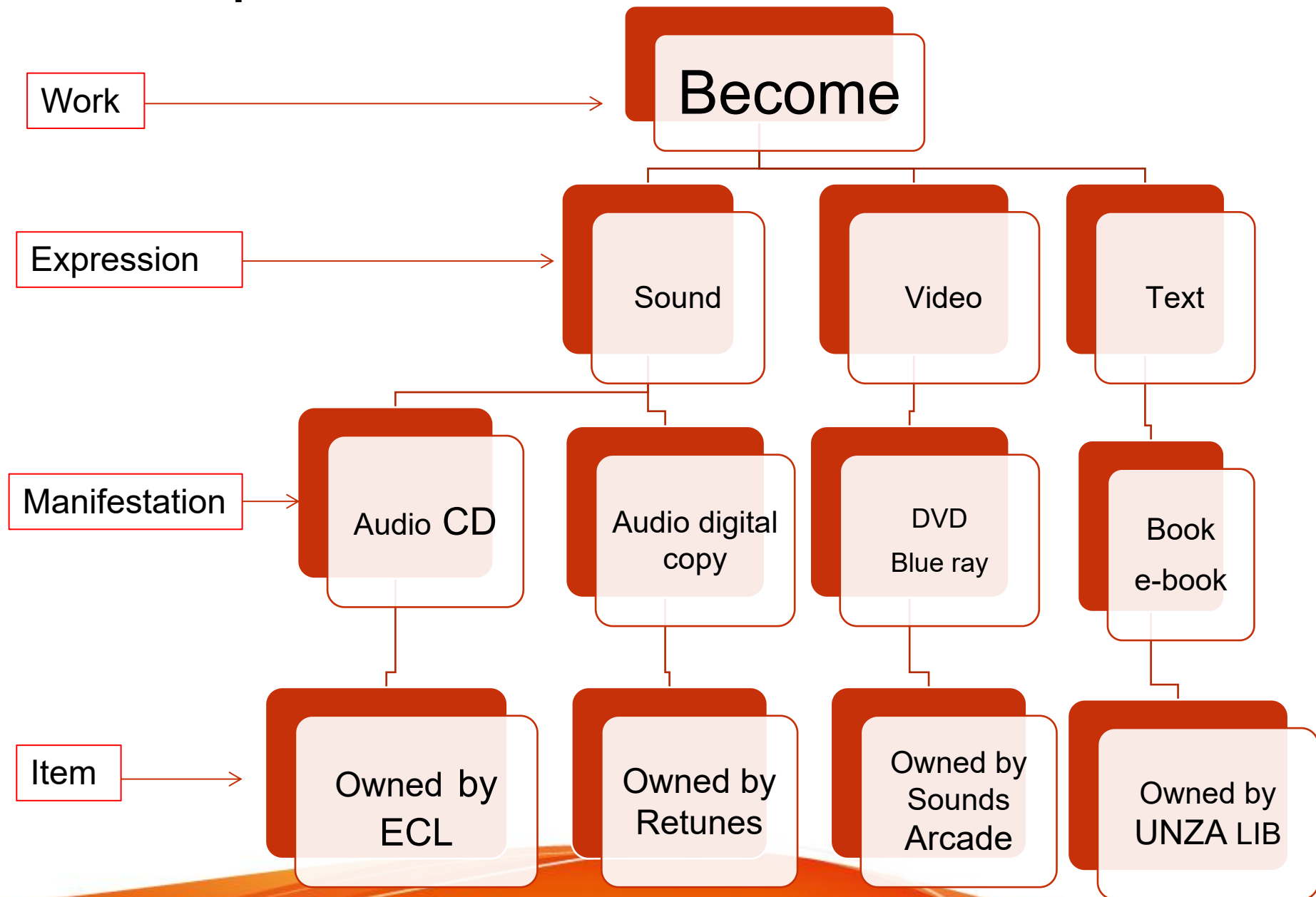
## □ Manifestation

- ❖ ID
- ❖ Title
- ❖ Statement of responsibility
- ❖ Edition
- ❖ Imprint (place, publisher, date)
- ❖ Form/extent of carrier
- ❖ Terms of availability
- ❖ Mode of access
- ❖ etc.

## □ Item

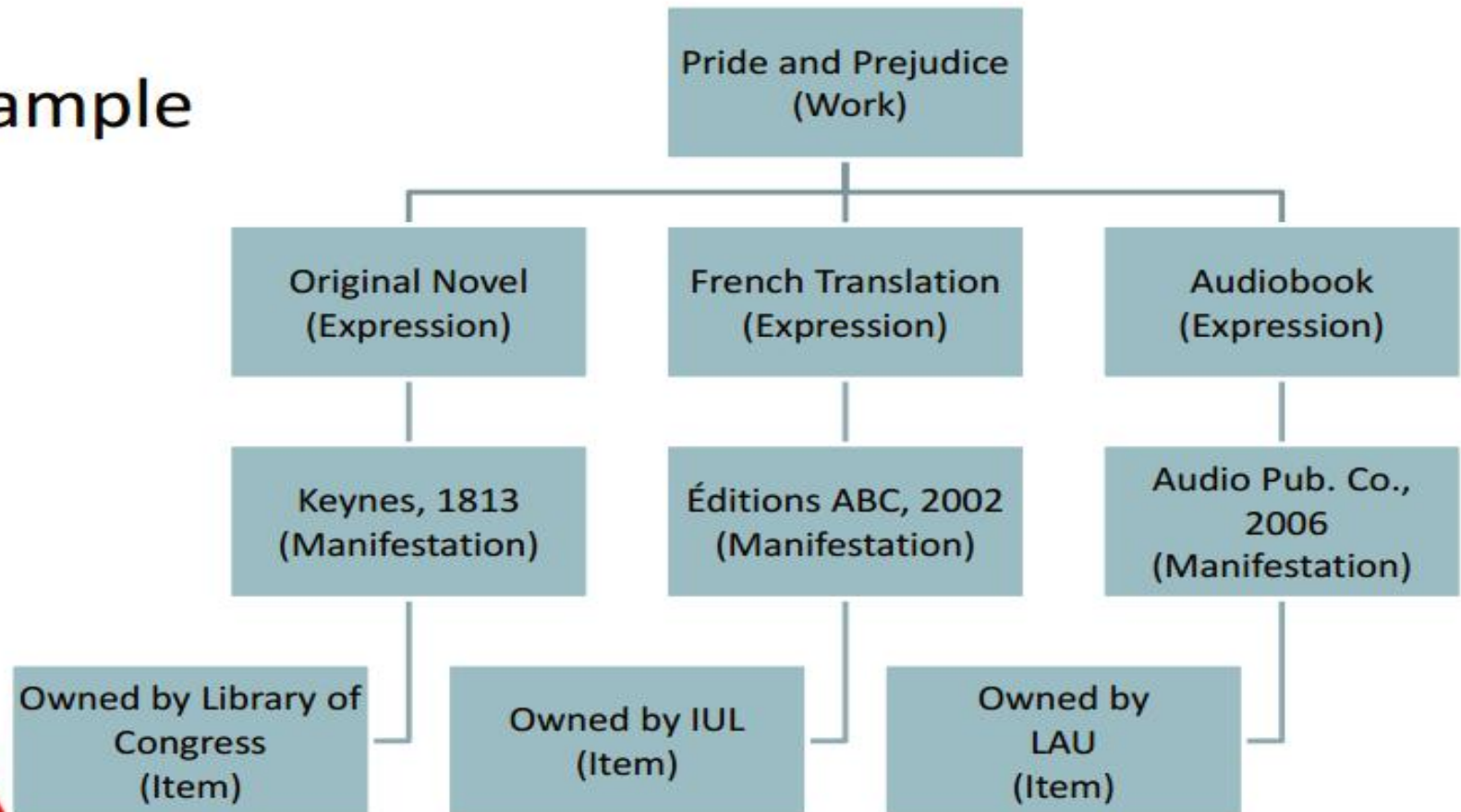
- ❖ ID
- ❖ Provenance
- ❖ Location
- ❖ etc.

# Example 2

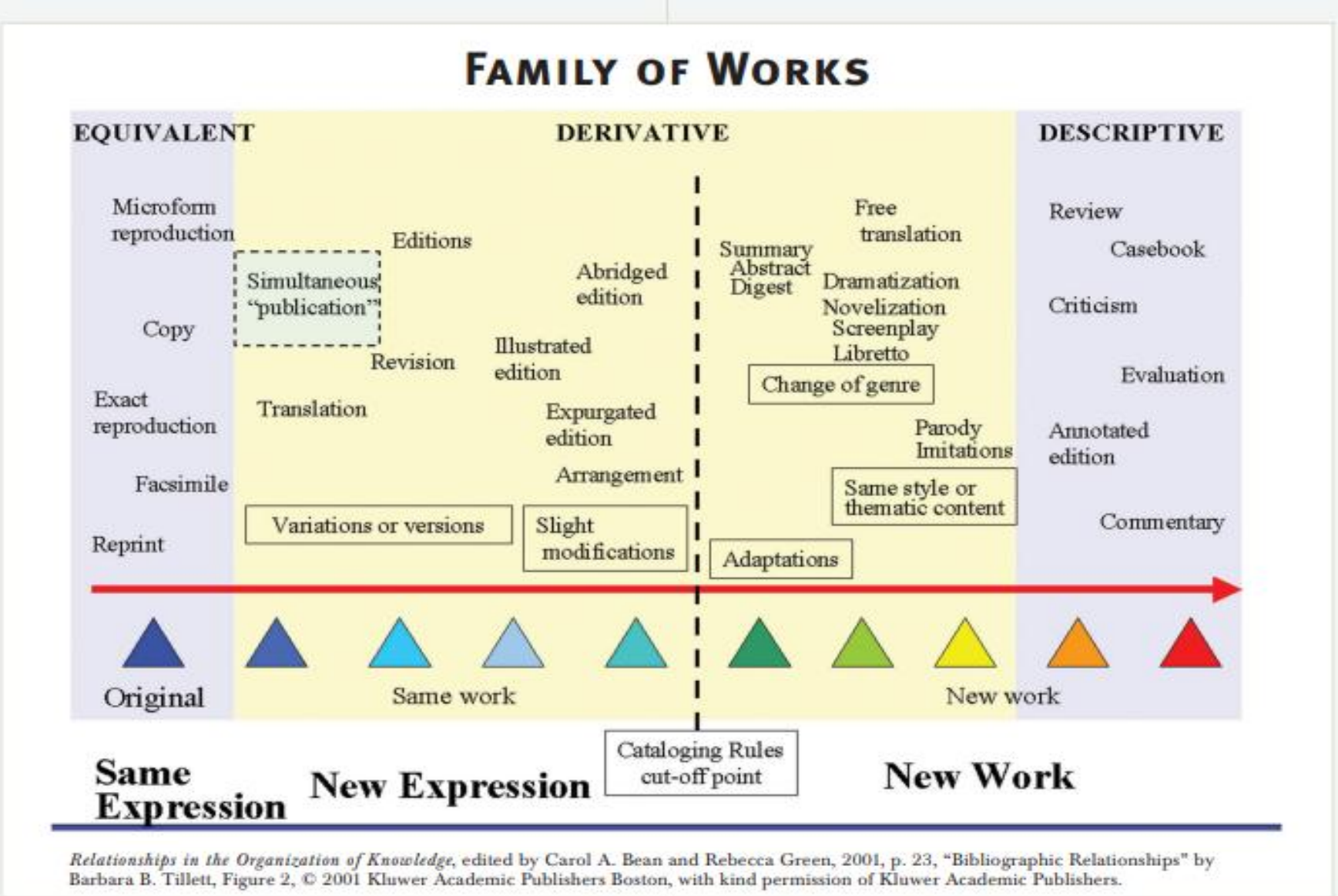


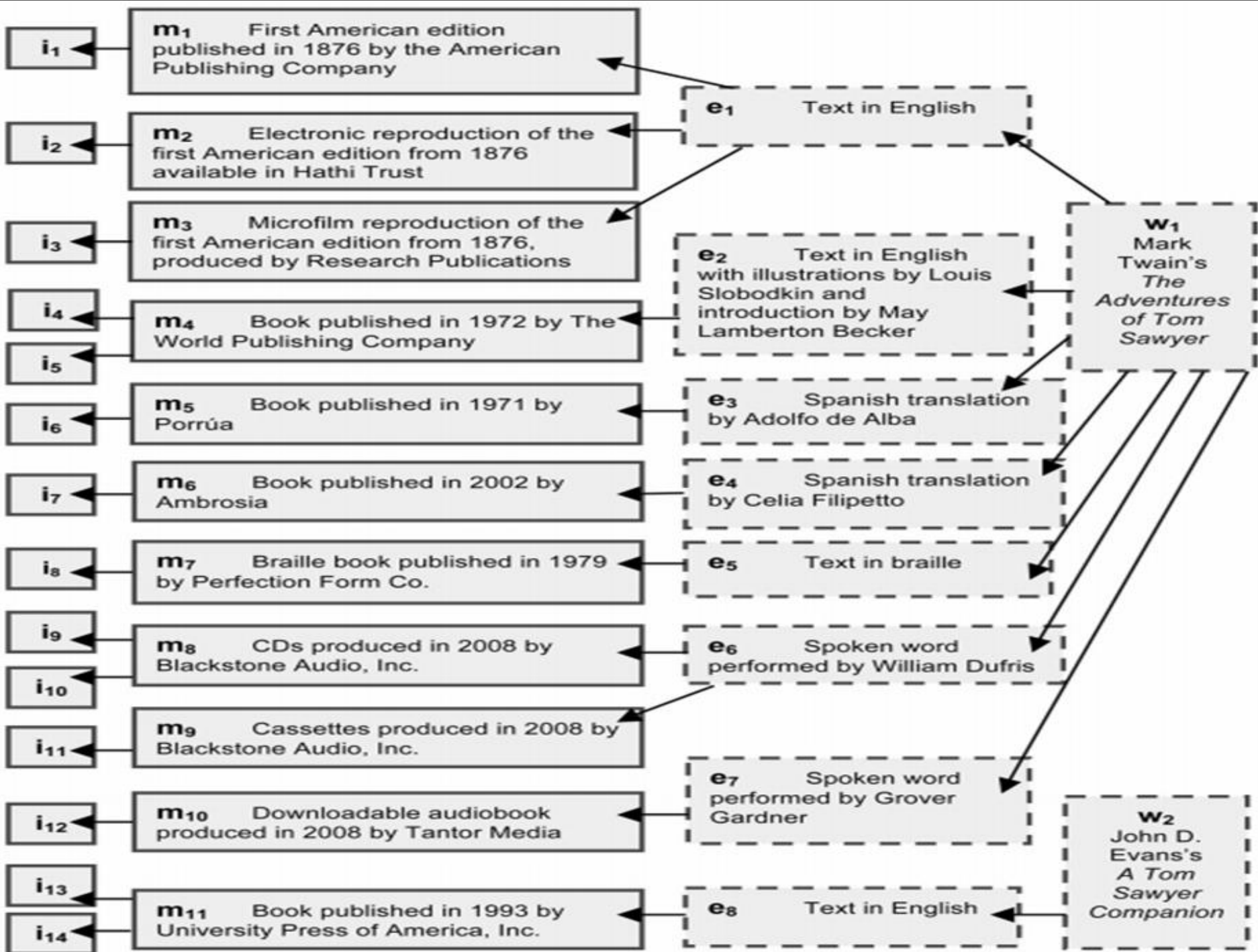
# FRBR Entities Group 1

## Example



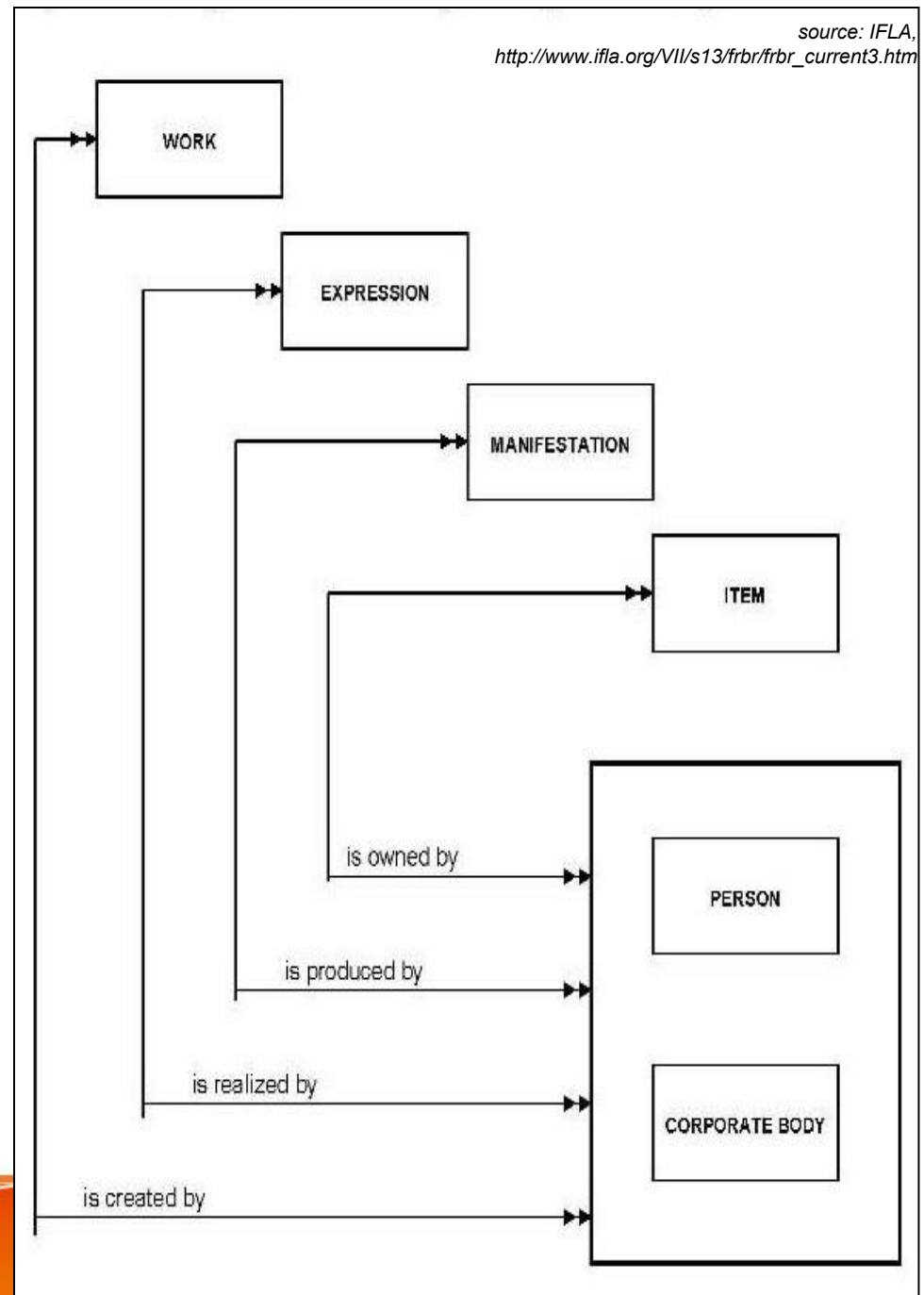
# Continuum from works/expressions/manifestations/items





# GROUP 2 Entities

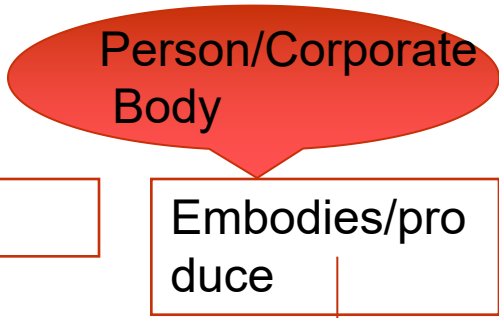
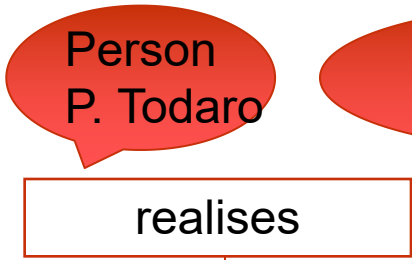
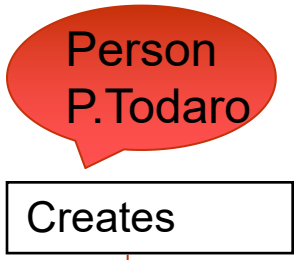
- Persons and corporate bodies, responsible for the creation or custodianship of Group 1 intellectual or artistic endeavor.



# Group 2



Group 2 Entities



Economic  
Development

Text -  
English

1st Edition by  
Mcmillan Books

UNZU Library

Electronic  
version - book

Vernon  
Mwaanga

Audio book by T.  
Bwalya

CD produced by  
mondo music

H. Lubinga

Group 1 Entities

Work

Expression

Manifestation

Item

# Group 3 Entities

Encompasses the entities that serve as the subjects of works.

- They describe a subject relationship
- Concept
- Object
- Event
- Place

Subject = **Aboutness** of a work

How to know the subject of a work

1. Acrimony (Book/Movie)
  1. Title
  2. Abstract/ Summary/ Forward
  3. Table contents
  4. Technical/ summarised reading
  5. Reviews
  6. Video/Audio (Watch/Listen)

# Group 3 Entities

**Concept:** an abstract notion or idea

• The entity **concept** may be the subject of a **work** entity

- e.g. economics,
- Library and Information Science,
- Biology,
- History of Zambia,
- Zambian Economics
- etc.

**Example: Title of Work: Inflation between 2011 – 2017 in Zambia; Subject: Zambian Economics**



# Group 3 Entities

**Object:** a material thing

• The **entity** defined as **object** serves as a subject of a work.

- e.g. Buckingham Palace,
- the Whitehouse,
- The statehouse
- Cathedral of the child Jesus,
- Old Trafford,
- Heroes stadium
- etc.

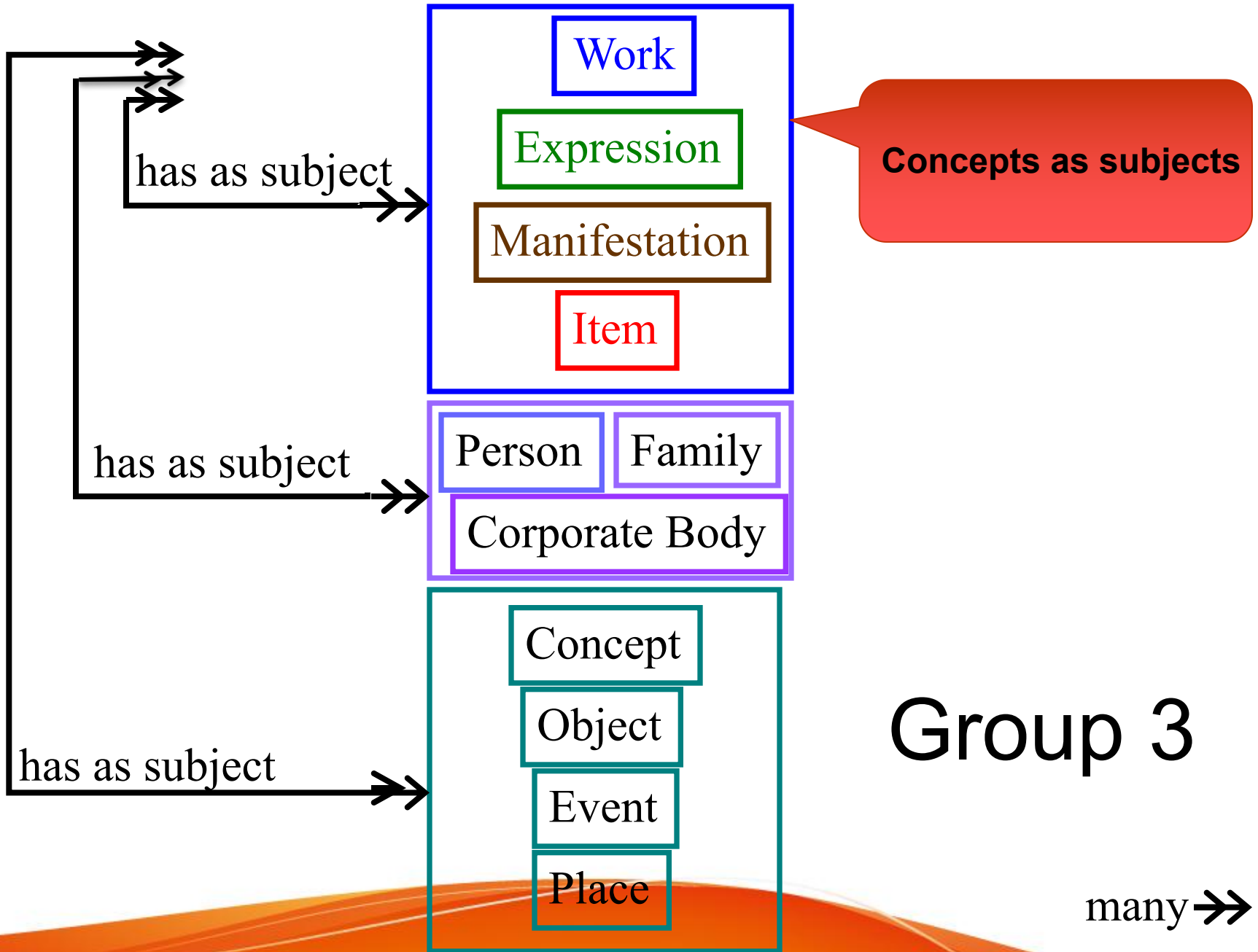
# Group 3 Entities

**Event:** an action or occurrence

- Includes Historical events, epochs, periods of time, battles, etc.
  - e.g. the Age of Enlightenment
  - The battle of ....
  - The enauguration ceremony...

**Place:** A location, terrestrial or extra-terrestrial

- Only locations that are the subject of a work are treated as a place entity.
  - e.g. Lusaka
  - Livingstone , etc.

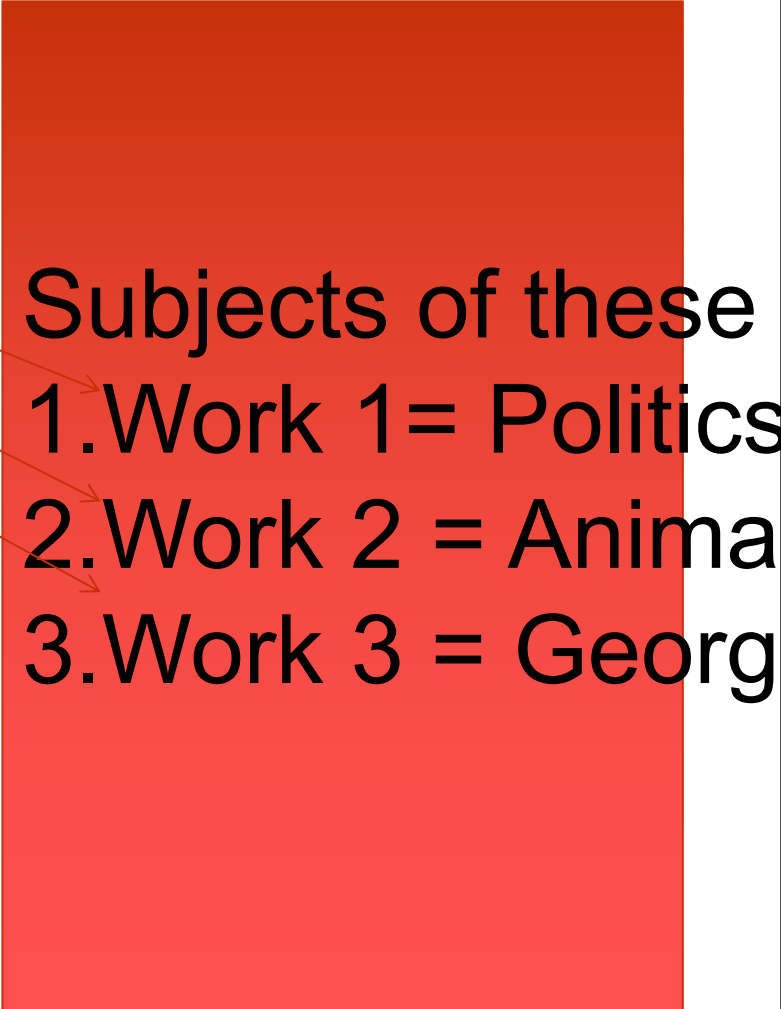


# Example of Group1, Group2 & Group3 as Subjects

- An author could write a commentary about Julius Chongo's 'Pocedza M'madzulo'
  - (a Group 1 work),
- a biography of Julius Chongo
  - (a Group 2 person), or
- a description of Chipata where Julius Chongo grew up
  - (a Group 3 place).

# Example

- Animal Farm
  - Author = George  
Owells
- Review of Animal Farm
  - Chasha francin
- A biography of George  
Owells
  - Daniel Daka

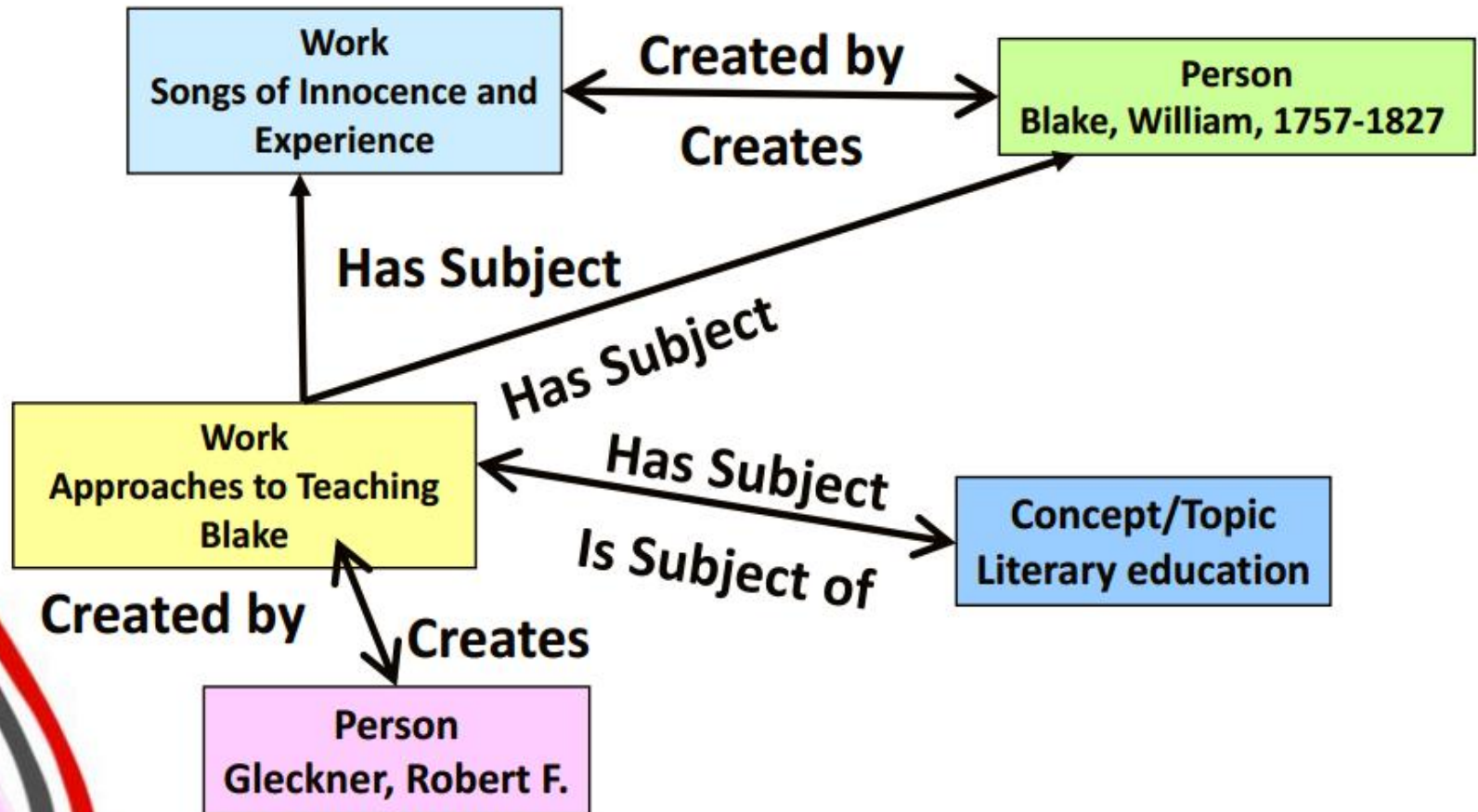


Subjects of these

1. Work 1 = Politics
2. Work 2 = Anima
3. Work 3 = Georg

# FRBR Entities Group 3


Example



# Group 3 entities

- Group 3 entities “serve as subjects of intellectual or artistic endeavor,” encompassing concepts, objects, events, and places in addition to all of the entities in Groups 1 and 2.

# What led to development of FRBR?

- “the introduction and on-going development of automated systems for the creation and processing of bibliographic data”
  - “the growth of large-scale databases, both national and international in scope, that contain records contributed and used by thousands of libraries participating in shared cataloguing programmes”.
- 

# FRBR, USER tasks

- **Find**

- “to locate either a single entity or a set of entities as the result of a search using an attribute or relationship of the entity”

- E.g. Locate “**Things fall apart**”,  
Using attributes: author, title, ISBD, publisher etc.

# FRBR, USER tasks

- **Identify**

- “to confirm that the entity described corresponds to the entity sought, or to distinguish between two or more entities with similar characteristics”

- E.g. Economic development/by Michael Todaro . – Second Edition

- E.g. Economic development/by Michael Todaro . – Tenth Edition

# FRBR, USER tasks

- **Select**

- “to choose an entity that meets the user's requirements with respect to content, physical format, etc., or to reject an entity as being inappropriate to the user's needs”

- E.g. 1.

- Desiring God, text;
- Desiring God audio;
- Desiring God Epub, etc.

- E.g.2.

- Desiring God, English;
- Desiring God, French (translated by a french author);

# FRBR, USER tasks

- **Obtain**

- “to acquire an entity through purchase, loan, etc., or to access an entity electronically through an online connection”

- E.g. Pursuit of God/by A W. Tozer, digital format. Available for purchase, loan or subscription basis

# **Benefits of FRBR**

## **Collocation**

- Better organization to the catalog
- Improves the user experience in locating information

## **Simplify cataloguing**

- Cut costs for the description and access to resources in our libraries
- Enabling links and re-use of identifying elements

## **Guide systems designs for the future**

## **Guide rule makers**

- Meant for the semantic web, emphasis on linkages
- 

# **Why we need to understand FRBR**

- RDA is based on FRBR conceptual model
- RDA uses terms and language in FRBR
- To make the catalog work best for patrons

## **What happens if you dont understand FRBR**

- It'll be hard to navigate the RDA text
  - It will be harder to use cataloger's judgment in context
  - You won't catalogue some areas correctly
  - You might not be able to use RDA at all
- 