

## OAI and Open Data

It's (still) what's for dinner.

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April, 2013

## OAI and Open Data

It's (still) what's for dinner.

... and who are you?

April, 2013

GRAND PRIX INTERNATIONAL DU FESTIVAL-CANNES 1967



**METRO-GOLDWYN-MAYER**

PRESENTS

A **CARLO PONTI** PRODUCTION

A film by

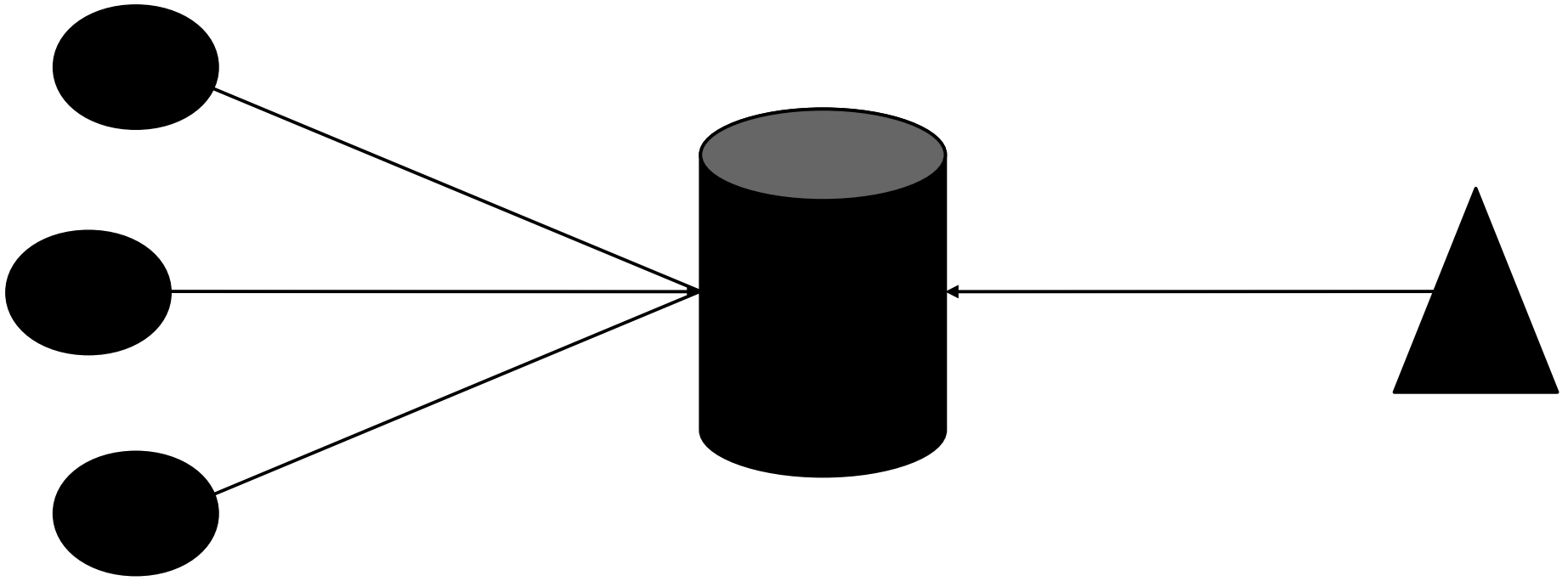
**MICHELANGELO  
ANTONIONI**

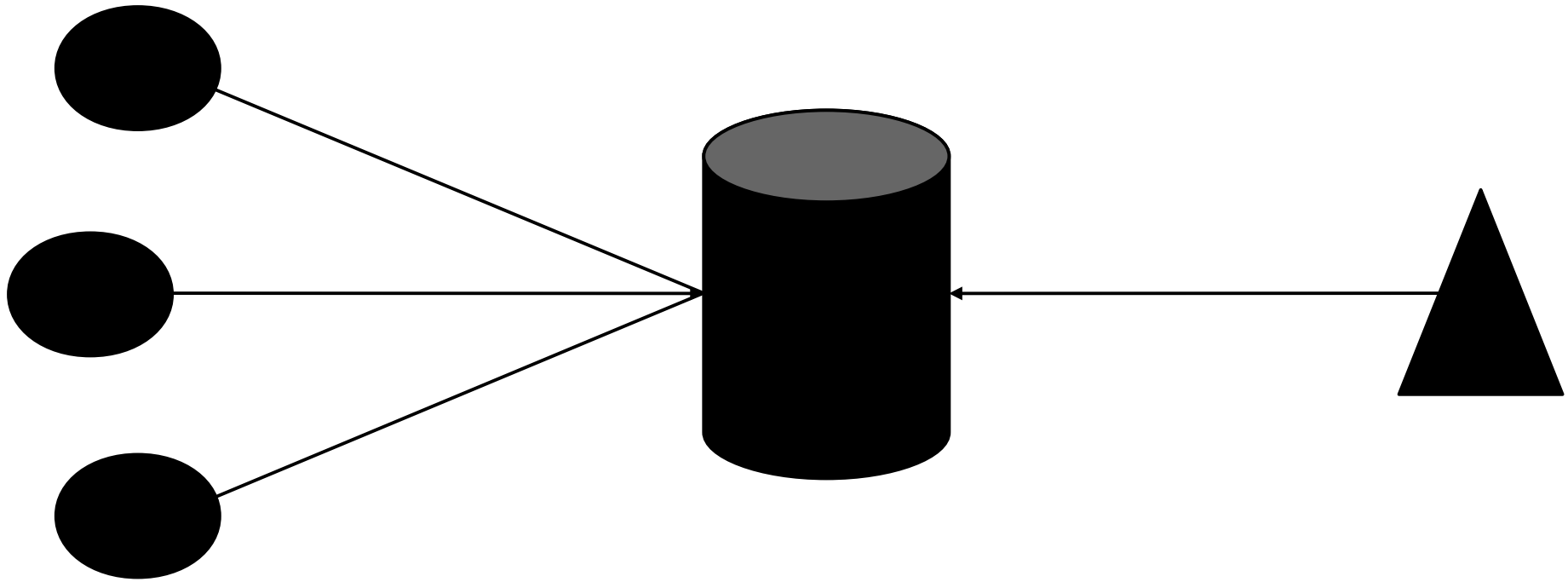
starring

**DAVID HEMMINGS**

AND **VANESSA REDGRAVE**







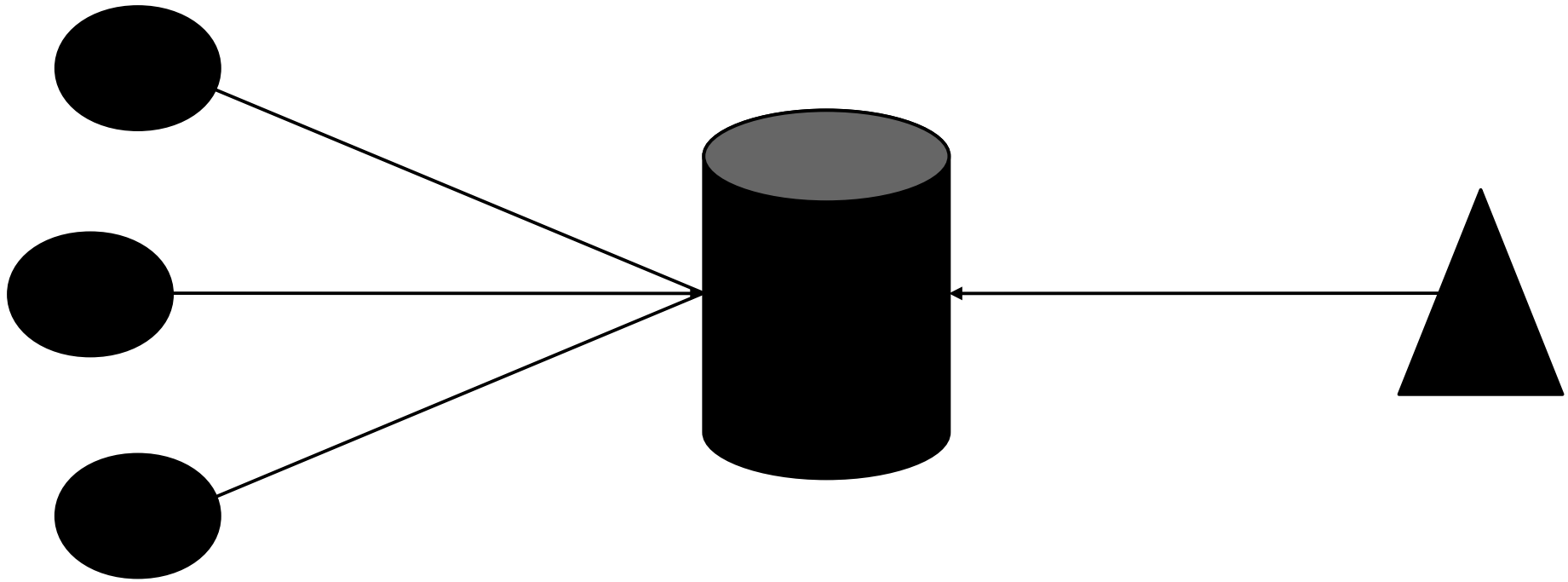
What does this represent?

- a) Kermit and Miss Piggy's dinner date?
- b) Harvesting and Exposing Open Data?

## 5 Course Meal (presentation):

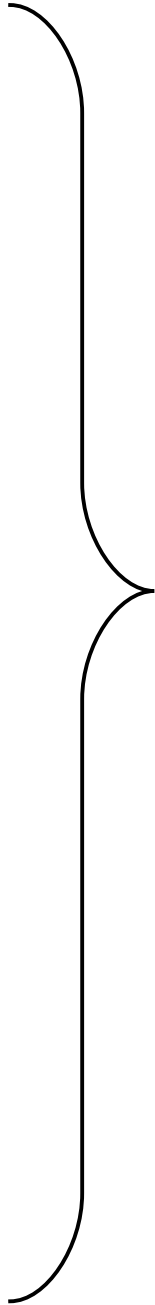
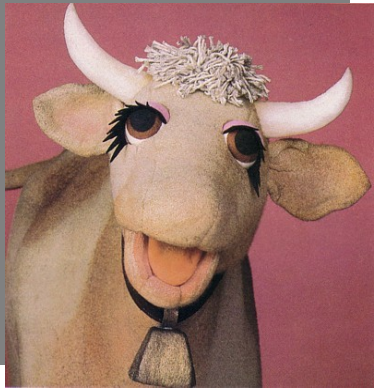
- 1) Discuss restaurant dining process.
- 2) Discuss searching indexed open data.
- 3) Discuss OAI “verbs”.
- 4) Demo: “NC ECHO”.
- 5) Activity, aka “dessert”.

Case for “A”  
Case for “B”



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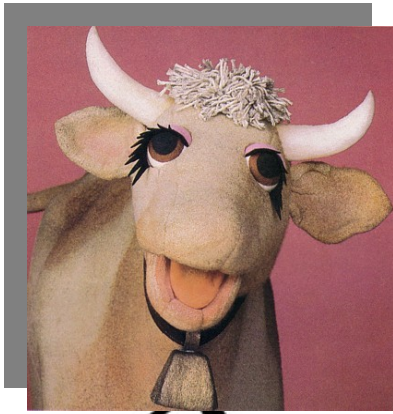


# 1) Discuss restaurant dining process.

- CONSUMPTION of stuff
- PROVISION of stuff
- ACQUISITION of stuff

# 1) Discuss restaurant dining process.

- CONSUMPTION
  - Access (menu, waiter, utensils, etc.)
  - PROVISION
- Preparation (FFE, utilities, storage, cooking)
  - ACQUISITION
- Ordering (vendors, communications, transportation)



ACQUISITION

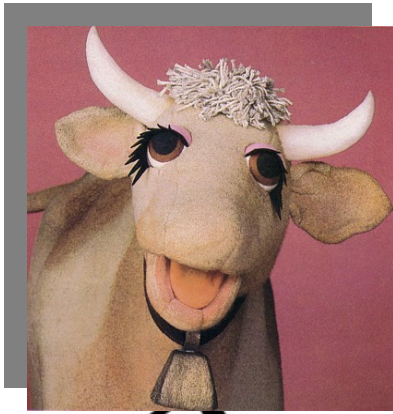


CONSUMPTION



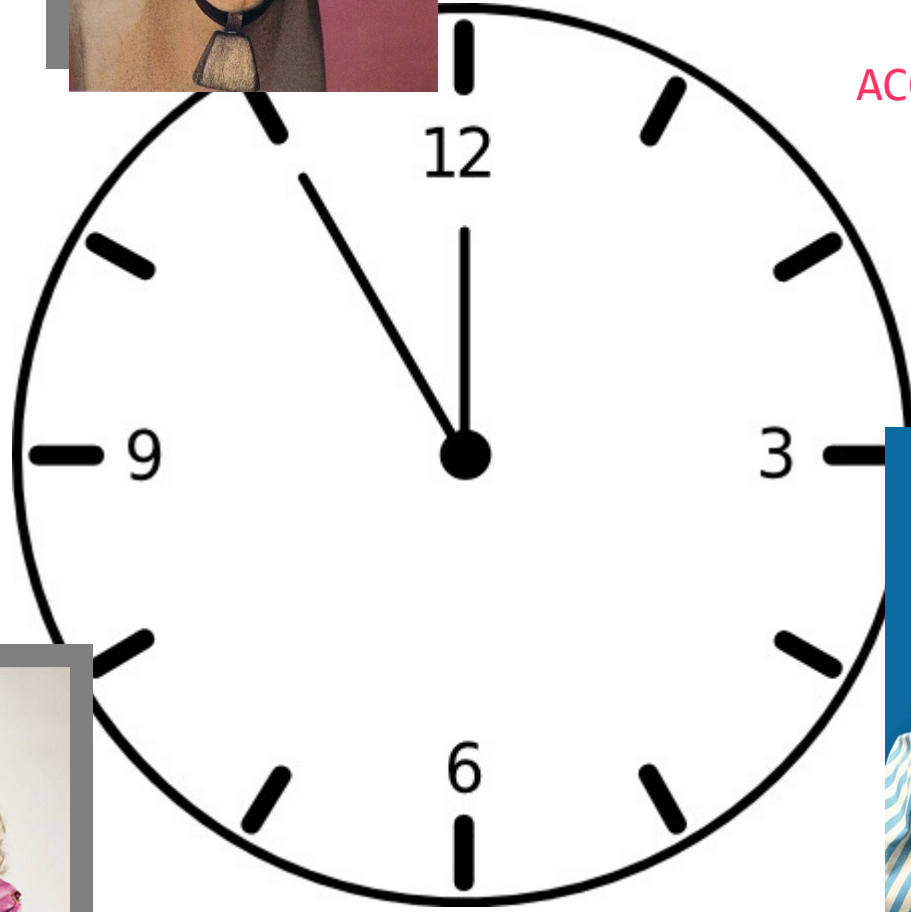
PROVISION





ordering

ACQUISITION



CONSUMPTION

access

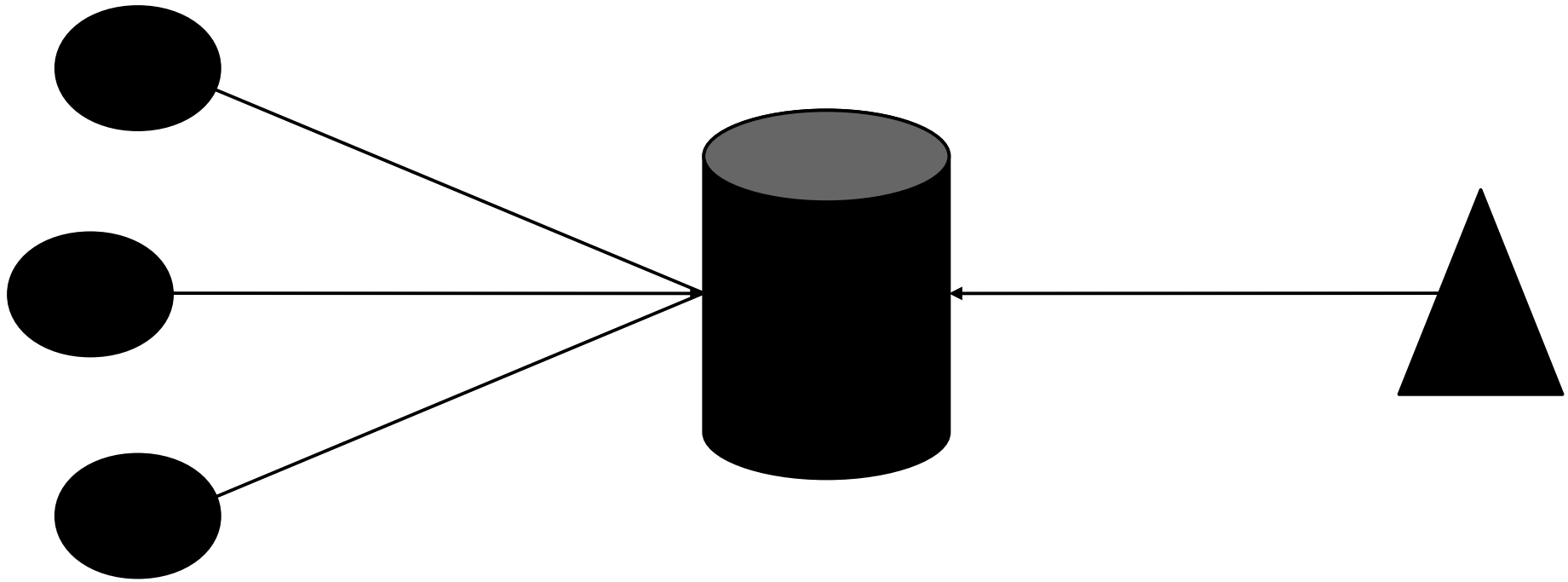


PROVISION

preparation



**Questions?**



What does this represent?

- a) Kermit and Miss Piggy's dinner date?
- b) Harvesting and Exposing Open Data?**



WIKIPEDIA  
*The Free Encyclopedia*

You Tube

flickr



## 2) Discuss searching indexed open data.

- CONSUMPTION of stuff
- PROVISION of stuff
- ACQUISITION of stuff

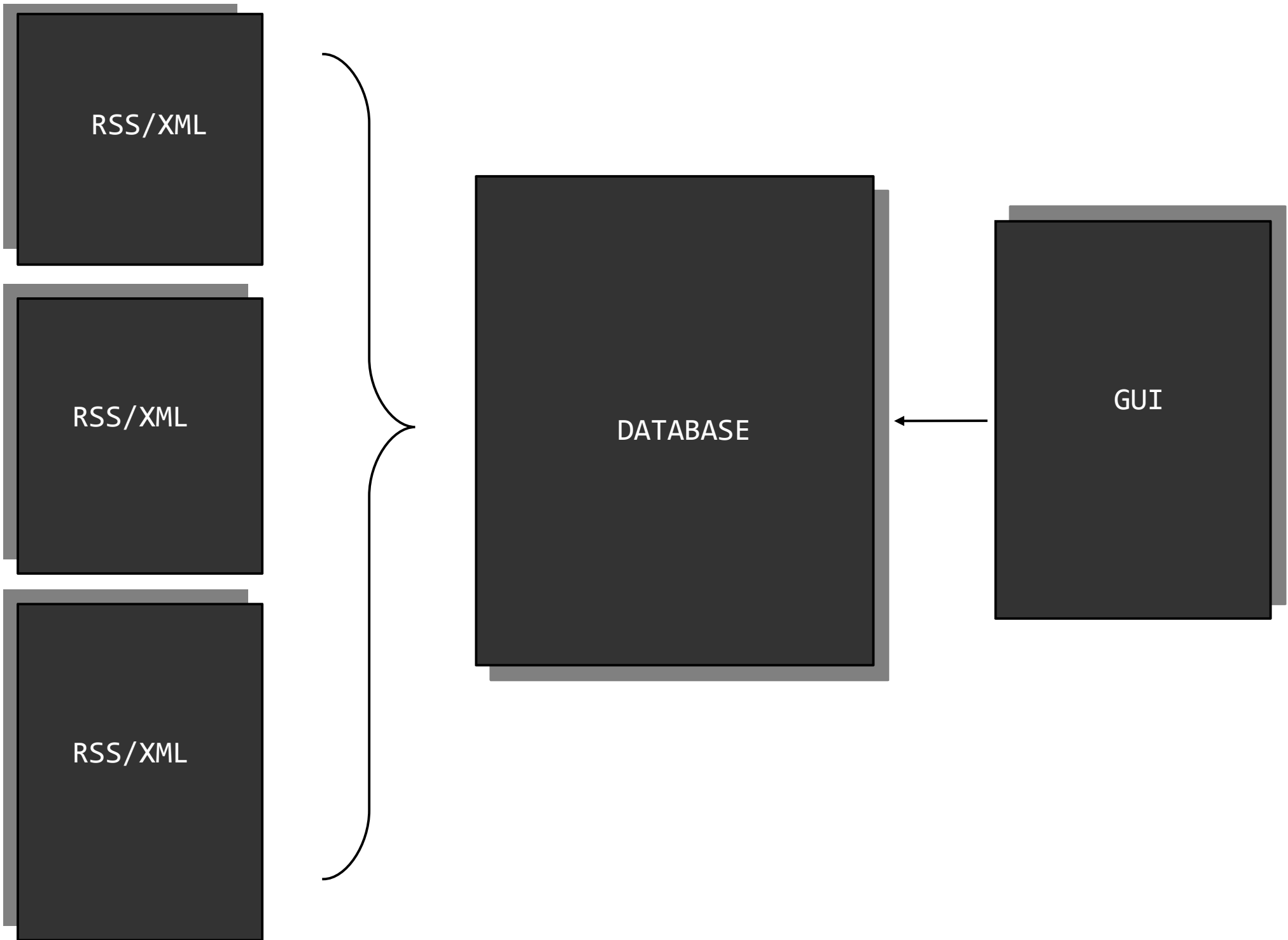


## 2) Discuss searching indexed open data.

- CONSUMPTION
  - Access (hardware/software, GUI, HTML/CSS/JS, etc.)
  - PROVISION
- Preparation (cross-walking, normalization, indexing/storage)
  - ACQUISITION
- Harvesting (repositories, communications, “transportation”)

## 2) Discuss searching indexed open data.

RSS much?



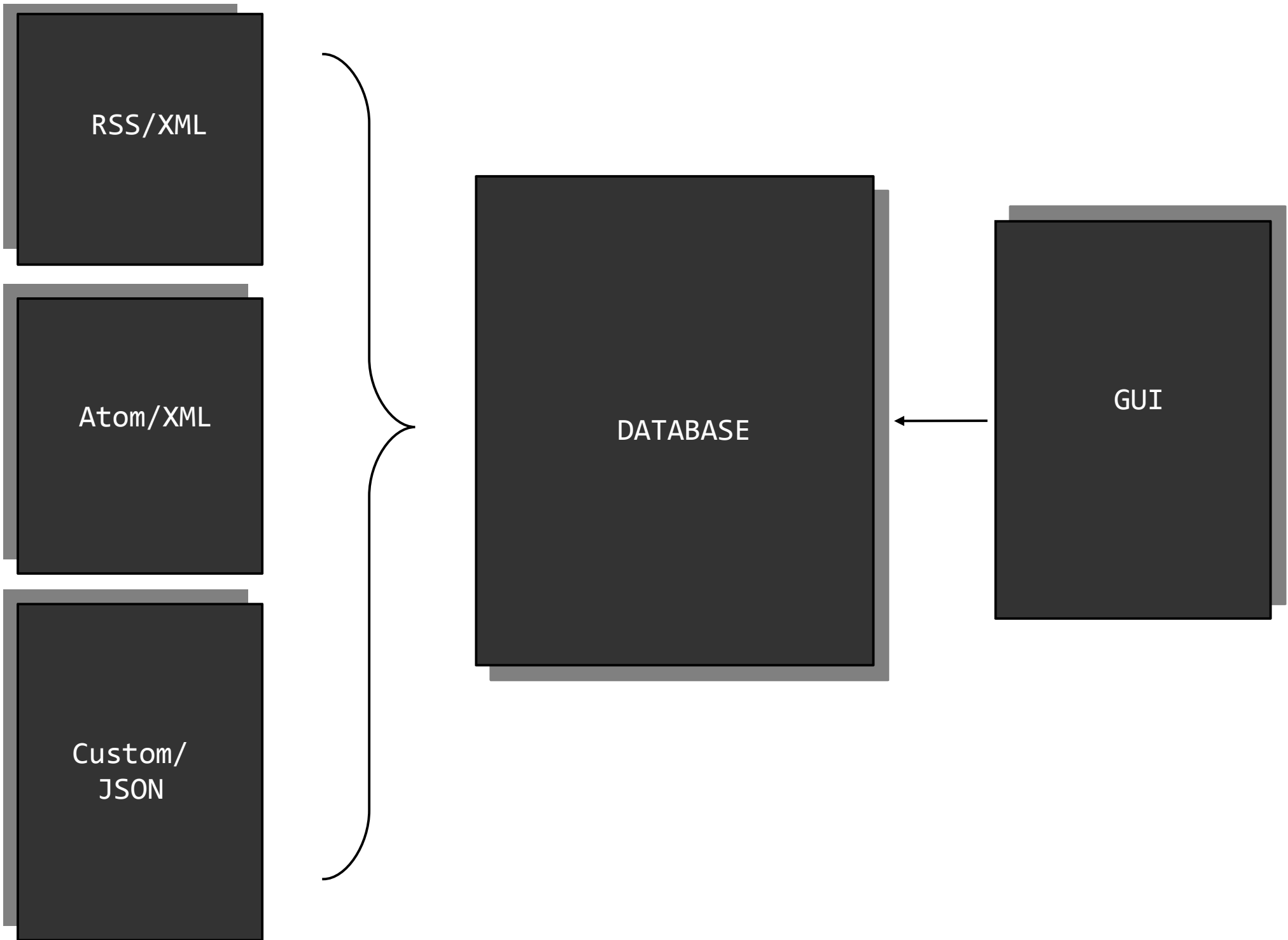
## 2) Discuss searching indexed open data.

Valid model for RSS reader?

## Questions:

RSS only?

XML only?



RSS/XML

Atom/XML

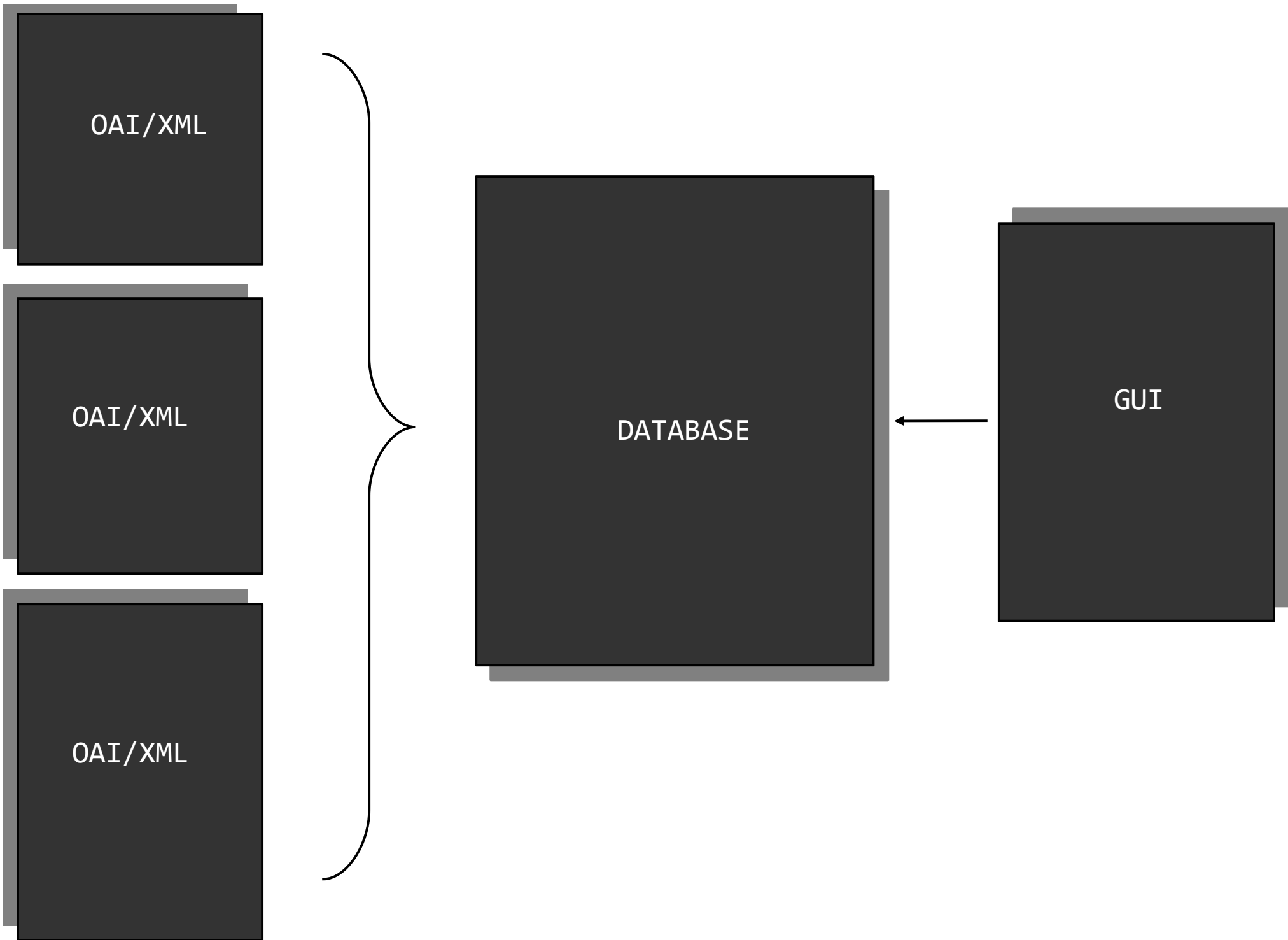
Custom/  
JSON

DATABASE

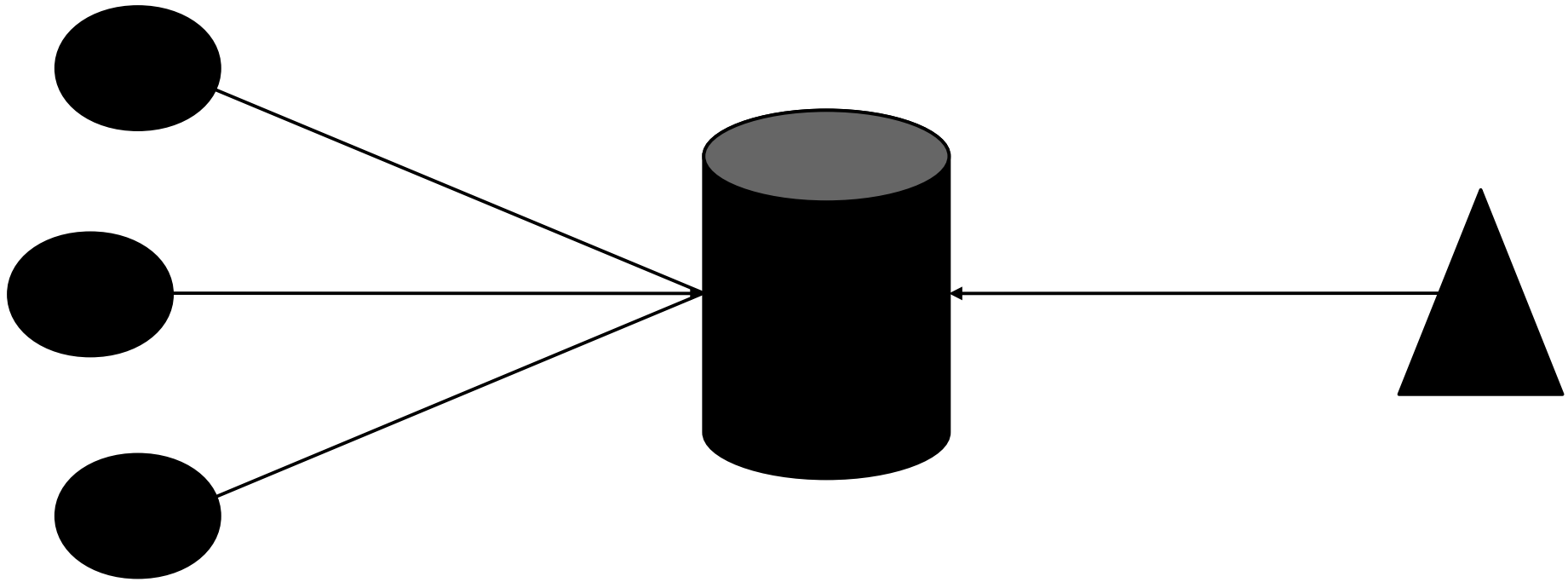
GUI

## Question:

If RSS/etc., then OAI?

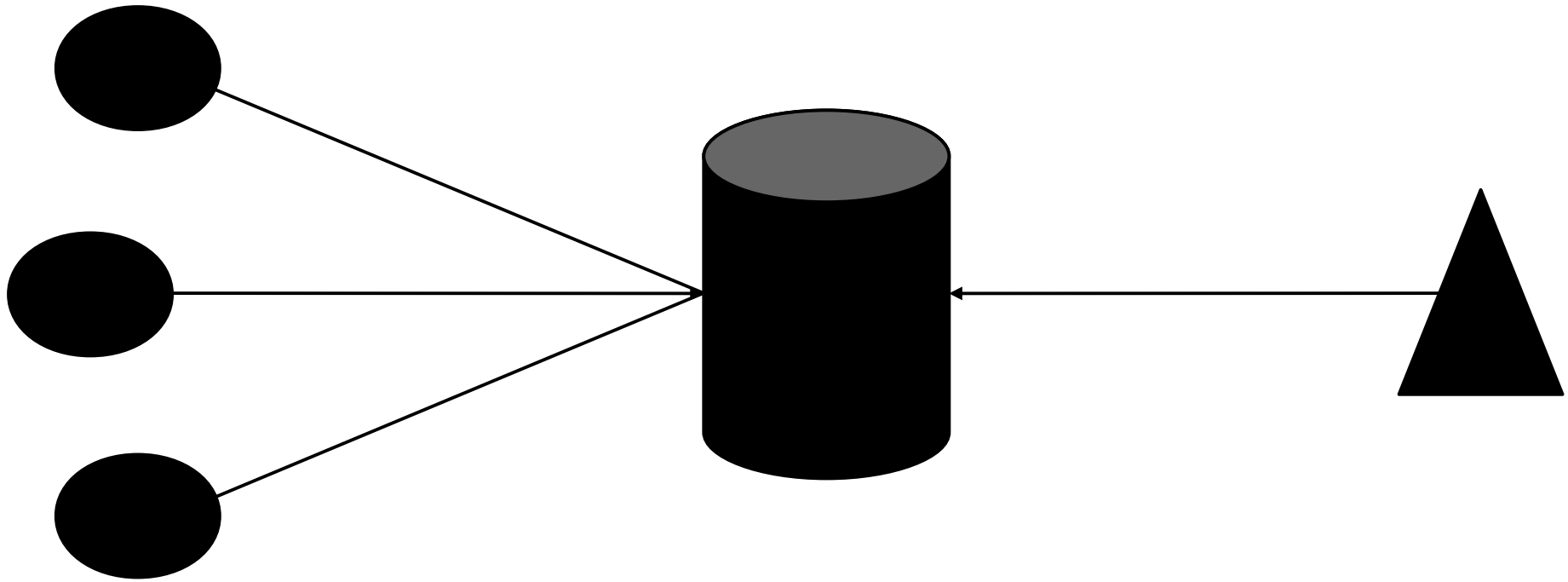






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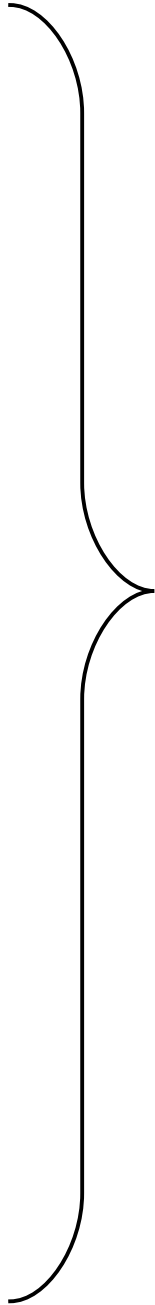
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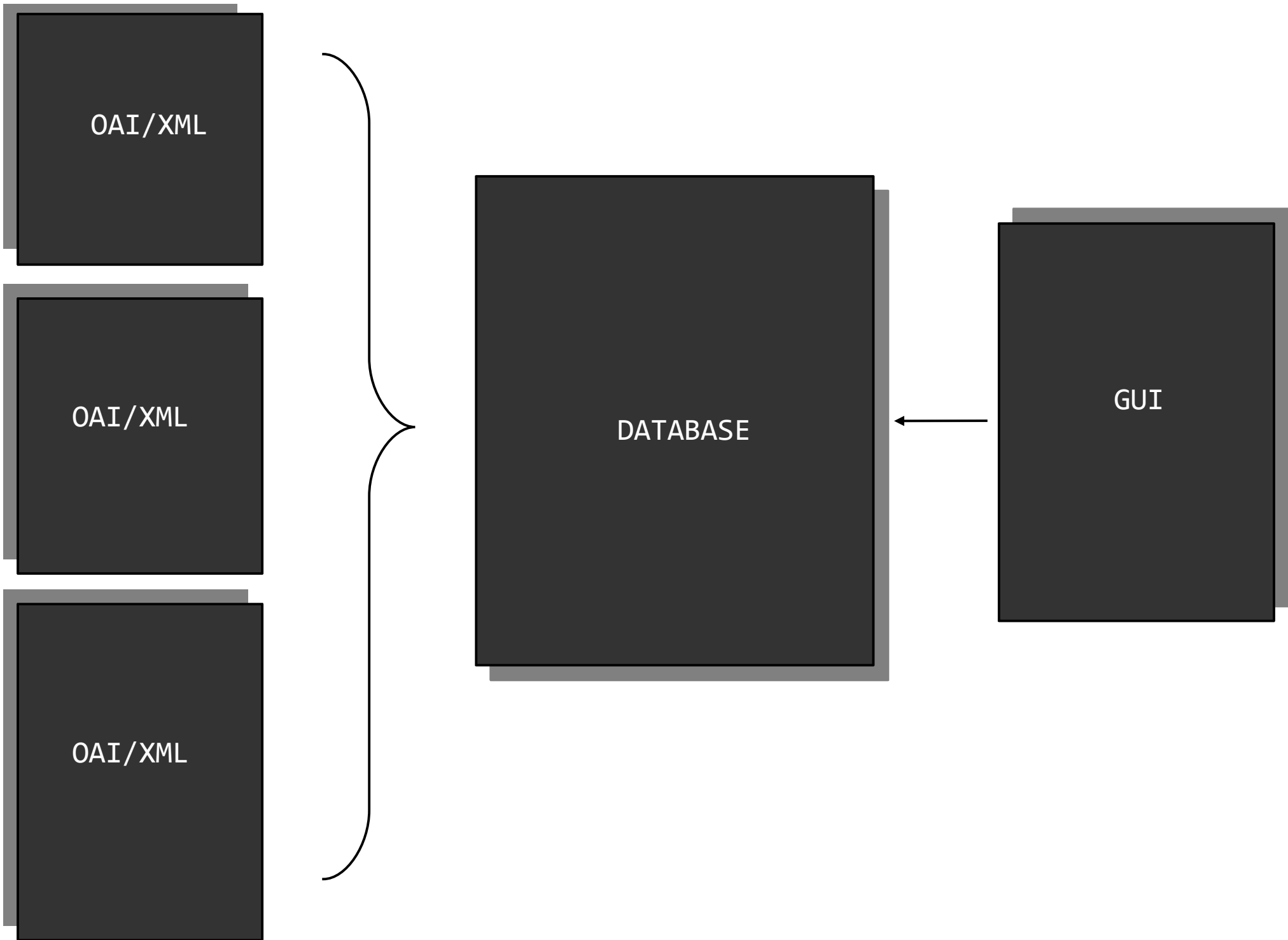


What does this represent?

- a) Kermit and Miss Piggy's dinner date?
- b) Harvesting and Exporting Open Data?

**c) ALL OF THE ABOVE!**





**Questions?**

**3) Discuss OAI “verbs”.**

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aka “protocol requests”

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aka “protocol requests”  
aka “ordering from the menu”



### 3) Discuss OAI “verbs”.

GetRecord	re: one item.
Identify	re: repository.
ListIdentifiers	re: item id's.
ListMetadataFormats	re: available schema.
ListRecords	re: items in collection.
ListSets	re: available collections.

### 3) Discuss OAI “verbs”.

GetRecord	re: one item.
Identify	re: repository.
ListIdentifiers	re: item id's.
ListMetadataFormats	re: available schema.
ListRecords	re: items in collection.
ListSets	re: available collections.

# Requests via URL:

Non-OAI examples:

- <http://www.bing.com/search?q=kittens>
- <http://www.bing.com/images/search?q=kittens>

# Requests via URL:

OAI examples:

- [http://memory.loc.gov/cgi-bin/oai2\\_0/?verb=ListSets](http://memory.loc.gov/cgi-bin/oai2_0/?verb=ListSets)
- [http://memory.loc.gov/cgi-bin/oai2\\_0/?verb=ListRecords&set=drwg&metadataPrefix=oai\\_dc](http://memory.loc.gov/cgi-bin/oai2_0/?verb=ListRecords&set=drwg&metadataPrefix=oai_dc)  
[http://memory.loc.gov/cgi-bin/oai2\\_0/?verb=ListRecords&resumptionToken=TZEE](http://memory.loc.gov/cgi-bin/oai2_0/?verb=ListRecords&resumptionToken=TZEE)

**Questions?**

## 4) Demo: “NC ECHO”

<http://ncecho.org>

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### *Collaborative Project:*

- State Library of NC
- NC Digital Heritage Center
  - NC LIVE

### *Technologies:*

- Languages: Python, XSLT; JavaScript, HTML, CSS
  - Data Format: XML
  - Data Model: OAI/DC
- Index/Query Engine: Apache SOLR
- other standard website “stuffs”
  - people power

**Questions?**



## 5) Activity, aka “dessert”.

<https://docs.google.com/document/d/1kbdMtS0b2u5i0WRjAUJHAcJ83hdppg0PtUwzNXPwXxY/e>

## Further Stuff:

<http://www.oaforum.org/tutorial/english/page1.htm>

<http://www.openarchives.org/OAI/openarchivesprotocol.html#ProtocolMessages>

[http://memory.loc.gov/ammem/oamh/oai\\_request.html](http://memory.loc.gov/ammem/oamh/oai_request.html)

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**Thanks !**