

# Title of the LREC 2012 Paper

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## Abstract

the main idea is to give an overview of the available benchmarks:

the story is:

- recently uptake of NIF for benchmarks
- general description from page 84 of [http://svn.aksw.org/papers/2013/Thesis\\_Sebastian/](http://svn.aksw.org/papers/2013/Thesis_Sebastian/)
- overview of existing benchmarks:
- validation with databugger

**Keywords:** NLP, Linked Data, Benchmark, Validation

## 1. Introduction

## 2. Background(sebastians thesis)

### 2.1. NIF

### 2.2. NER Extension of NIF

### 2.3. Linked Data Principles in NIF (Lim)

## 3. Existing corpora

### 3.1. N3 (Ricardo)

<http://aksw.org/Projects/N3NERNEDNIF.html>

### 3.2. Magnus

(Steinmetz et al., 2013): DBpedia Spotlight dataset, KORE 50 (AIDA), Wikilinks Corpus (Singh et al., 2012) subset (triplicated by AKSW)

### 3.3. Wikilinks(Martin)

The NIF conversion of the Wikilinks corpus, as described in (Hellmann et al., 2013), could be improved by using the expanded dataset. Now every item of the corpus contains the full DOM of a website, its URI as well as a number of mentions that link to the English Wikipedia, including the link text and the context string. It still is very large in scale, containing over 3 million items and 40 million mentions. However, the compressed size has grown to 180GB, making it much harder to handle, but at the same time granting much better conversion opportunities. For instance, the complete DOM structures can be used to identify the context of the mentions much better and extract more text useable for NER disambiguation. You can see an example in Listing 1

The new NIF conversion establishes one `nif:Context` per item, instead of one per mention, like before. The DOM of the website is parsed and every mention's link is found to extract the relevant surrounding HTML element's text. This results in a clean and semantically relevant text

snippet for each mention, instead of the arbitrary context strings of fixed length that were used before. In addition to linking DBpedia via `itsrdf:taIdentRef`, DBpedia ontology types<sup>1</sup> were included for every mention having a DBpedia ontology type via `itsrdf:taClassRef`. NERD classes directly mapping the DBpedia ontology types were also included via `itsrdf:taClassRef`. To be able to directly identify a coarse grained instance type (i.e. Person, Location, Organization, etc.), the NERD core class containing the mapped NERD class was added via `nif:taNerdCoreClassRef`.

```
1 <http://wiki-link.nlp2rdf.org/linkeddata.php?t=url&f=
2 html&i=http://www.methodinit.org.uk/methodinit/2007/
3 11#char=0,8353>
4 a nif:String , nif:Context , nif:RFC5147String ;
5 nif:isString ""A Libertarian and Relativist quote
6 taken from the Christian Anarchist Leo Tolstoy .
7 Somewhat compatible with discourse
8 theory.""^xsd:string;
9 nif:beginIndex "0"^xsd:nonNegativeInteger;
10 nif:endIndex "8353"^xsd:nonNegativeInteger;
11 nif:sourceUrl
12 <http://www.methodinit.org.uk/methodinit/2007/11> .
13
14 <http://wiki-link.nlp2rdf.org/linkeddata.php?t=url&f=
15 html&i=http://www.methodinit.org.uk/methodinit/2007/
16 11#char=70,81>
17 a nif:String , nif:RFC5147String ;
18 nif:referenceContext <http://wiki-link.nlp2rdf.org/
19 linkeddata.php?t=url&f=html&i=
20 http://www.methodinit.org.uk/methodinit/2007/11
21 #char=0,8353> ;
22 nif:anchorOf ""Leo Tolstoy""^xsd:string ;
23 nif:beginIndex "70"^xsd:nonNegativeInteger ;
24 nif:endIndex "81"^xsd:nonNegativeInteger ;
25 a nif:Phrase ;
26 itsrdf:taClassRef
27 <http://dbpedia.org/ontology/Writer> ;
28 itsrdf:taClassRef
29 <http://dbpedia.org/ontology/Artist> ;
30 itsrdf:taClassRef
31 <http://nerd.eurecom.fr/ontology#Artist> ;
32 itsrdf:taClassRef
33 <http://dbpedia.org/ontology/Person> ;
34 itsrdf:taClassRef
35 <http://dbpedia.org/ontology/Agent> ;
36 nif:taNerdCoreClassRef
37 <http://nerd.eurecom.fr/ontology#Person> ;
38 itsrdf:taIdentRef
```

<sup>1</sup>[http://downloads.dbpedia.org/3.9/en/instance\\_types\\_en.nt.bz2](http://downloads.dbpedia.org/3.9/en/instance_types_en.nt.bz2)

39 `<http://dbpedia.org/resource/Leo_Tolstoy> .`

Listing 1: A converted wikilinks item including one mention

### **3.4. wikipedia corpus (Lim with help from Felix, Dimitris)**

- our wikipedia corpus, i.e. felix xslt script (= Wikilinks Corpus ?)

### **3.5. Overview + Table (Lim)**

[http://svn.aksw.org/papers/2014/ESWC\\_NLP\\_Cleansing/](http://svn.aksw.org/papers/2014/ESWC_NLP_Cleansing/)

## **4. Validation (Dimitris)**

## **5. Towards Standardized NER Benchmarking based on Gate (Milan)**

## **6. Related Work and Conclusions**

## **7. Acknowledgements**

Place all acknowledgements (including those concerning research grants and funding) in a separate section at the end of the article.

## **8. References**

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