



Research Networking Programmes

Short Visit Grant or Exchange Visit Grant

(please tick the relevant box)

Scientific Report

The scientific report (WORD or PDF file – maximum of eight A4 pages) should be submitted online within one month of the event. It will be published on the ESF website.

Proposal Title: Quantitative analysis of metaphorical motion

Application Reference N°: 7002

1) Purpose of the visit

The purpose of the visit was to explore and discuss with Dr. Carita Paradis and her research group at Lund University the best ways to apply quantitative and statistical analyses to metaphorical word meaning in the domain of motion events in three specific genres (architectural reviews, wine tasting notes, and tennis reports).

2) Description of the work carried out during the visit

During this visit I carried out three different kinds of activities:

a. Meetings with different members of Dr. Paradis' research team and other colleagues at Lund University.

I discuss the goals of my research on metaphorical motion as well as the usage of different statistical analyses to describe these data with different colleagues. I had two meetings with Dr. Marianne Gullberg, one meeting with Dr. Jordan Zlatev and two meetings (as well as several email working exchanges) with Dr. Joost van der Weijer.

b. Corpus data and statistical analyses

I cleaned up the corpora I'm using for this research (300,000 words in Spanish) and prepared the necessary information in excel to run the statistics. This means a detailed analysis of the types and tokens of all motion verbs in the corpora, as well as the types and tokens for the complementary information about Manner and Path descriptions in each verb.

c. A guest lecture at the Centre for Languages and Literature (Lund U.), 10/12/2014.

Together with my colleague Rosario Caballero we delivered a two-hour lecture on our work on metaphorical motion for all the members of the Centre for Languages and Literature. We presented an overview of the research project, qualitative results as well as freshly-analysed quantitative data (we prepared at Lund).

3) Description of the main results obtained

There are two main results to be reported here:

-Qualitative analysis:

In general, the lexicalization and rhetorical differences between Spanish and English regarding Path and Manner discussed in the physical motion event literature are sustained in the three genres in my corpus. English has a total of 520 different types of motion verbs and Spanish 388 different verbs. English describes Path and Manner more often and expressively than Spanish. However, the specific genre does have an impact of the quality and quantity of these metaphorical motion descriptions. In both languages, motion event descriptions are more expressive than customarily described with more tokens and more types of verbs not found in other discourse contexts. However, what is really interesting is to have found that Spanish, despite being less expressive than English, displays a richer and more colourful motion verbs lexicon than expected. The next step will be to compare data not only between languages, but also across and within genres.

-Quantitative analysis

The different behaviour pointed out in the previous section shows up in the statistical analysis. We compare our data in metaphorical motion with previous results in physical motion in both languages. Descriptive statistics already supports the qualitative data. English metaphorical and physical motion events follow a similar pattern with a clearly frequent usage of manner of motion verbs. Spanish metaphorical and physical motion events, on the other hand, do not behave the same. Whereas in physical motion there is a clear tendency to use non-manner motion verbs, this pattern disappears in metaphorical motion. This tendency yields statistical significant results when running a more detailed analysis on Path and Manner descriptions and taking into account two variables: language (English, Spanish) and corpus genre (architecture, wine, tennis). As shown in the diagrams below, Spanish and English architecture and tennis Path and Manner descriptions behave similarly, but Spanish tennis shows a different tendency. It seems that wine motion events follow a different pattern: motion events contain more expressive and frequent descriptions of these two semantic components, Path and Manner. These findings confirm our initial hypothesis and open up new lines of analyses. We plan to apply different statistical methods to capture all these differences (e.g. multidimensional scaling, principal component analysis, consistency indexes, pivot tables, data plots, etc.).

4) Future collaboration with host institution (if applicable)

I will keep on collaborating with Dr. Paradis and her research team. Depending upon finance, we schedule a new short visit for 2015. More concretely, and as a direct result of this short stay, I (together with my collaborator Dr. Rosario Caballero) will work with Dr. Joost van der Weijer, who specialises in statistics and language analysis. We will work together to provide a full quantitative study on metaphorical motion events in Spanish and English based on a genre-driven corpus.

5) Projected publications / articles resulting or to result from the grant (*ESF must be acknowledged in publications resulting from the grantee's work in relation with the grant*)

There is a planned publication tentatively scheduled for the end of 2015 reporting on the quantitative analysis described in the previous section. This paper will be co-authored paper together with Dr. Rosario Caballero and Dr. Joost van der Weijer and we are aiming at a ISI journal such as Corpus Linguistics.

We will present some of our results in the Networks 2015 Conference in Pisa and probably write a paper based on the talk (just on qualitative results).

6) Other comments (if any)

I would like to thank the ESF for funding my short research stay. It has been very satisfactory and fruitful. I had a chance to meet new colleagues, discuss my work (in just one week my research has advanced enormously) and plan new venues for the future.