New trends in knowledge dissemination: TED Talks

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ABSTRACT. This paper investigates the key elements of *ethos, pathos* and *logos* linguistic strategies as some main features of TED (Technology, Entertainment, Design) Talks, popularizing speeches aiming at Knowledge Dissemination. Through a comparison between the TED Talk 'HIV - How to fight an epidemic of bad laws', by Shereen El-Feki (2012a), and another speech held by the same author at the 2012 Symposia The Global Commission on HIV and the Law, addressed to specialists, the paper analyses TED Talks as an innovative tool of popularization, which breaches the typical triangularisation 'scientist-mediator-audience', bringing scientists directly into contact with their audiences. Drawing upon Aristotle's three pillars of rhetoric, the paper analyses the strategies used to establish the *ethos* of the speech, by proposing a topic as morally worth of spreading; *pathos*, by creating a direct contact with the public; and *logos*, investigated through an analysis of the elements used to recontextualise scientific discourses into popularized speeches. The analysis suggests that TED Talks are a recodification, not a mere translation of texts; they are a means to disseminate knowledge reducing the asymmetry between audiences and scientists.

Keywords: TED talks, popularization, new media, linguistic strategies, knowledge dissemination.

Novas tendências na disseminação do conhecimento: os Discursos TED

RESUMO. Este artigo investiga as estratégias linguísticas dos elementos chave *ethos, pathos* e *logos* como algumas das principais características dos discursos TED (Tecnologia, Entretenimento, Design), os quais têm por objetivo disseminar o conhecimento acerca desse gênero. A partir da comparação de duas palestras proferidas por El-Feki, uma intitulada "TED intitulado 'HIV – Como lutar contra uma epidemia de leis ruins' e outra direcionada a especialistas, esse artigo analisa os Discursos TED como uma ferramenta inovadora de popularização, a qual rompe o triângulo cientista-mediador-plateia, fazendo com que os cientistas entrem diretamente em contato com seus ouvintes.Baseando-se nos três pilares aristotélicos da retórica, analisam-se as estratégias para estabelecer o *ethos* do discurso, ao propor um tópico que merece ser disseminado; *pathos*, pelo estabelecimento de um contato direto com a plateia; e *logos*, que consiste na discussão dos elementos para recontextualizar os discursos científicos em discursos popularizados. A análise sugere que os Discursos TED são uma recodificação e não uma simples tradução de textos. São meios para disseminar o conhecimento, reduzindo a assimetria entre a plateia e os cientistas.

Palavras-chave: Discurso TED, popularização, novos meios sociais, estratégias linguísticas, disseminação do conhecimento.

Introduction

Current paper investigates the key elements *ethos, pathos* and *logos* strategies as some main features of TED talks, which are popularising speeches aiming at Knowledge Dissemination.

Popularisation "[...] is a social process consisting of a large class of discursive-semiotic practices […] aiming to communicate lay versions of scientific knowledge […]" (CALSAMIGLIA; VAN DIJK, 2004, p. 371).

Traditionally, research on popularising texts have concentrated on written discourse with a 'canonical view' (GRUNDMANN; CAVAILLÉ, 2000) of popularisation, according to which there is a clear-cut distinction between scientific and popularised texts. This standpoint implies that science is built on a hermetic language that needs to be 'translated' from the science world to a popularised context, where the audience is seen as an ignorant mass on which the scientific community has the power to decide what has to be known and what not.

Only during the last decade, studies on professional-lay interaction have focussed more on mass media, which have become the main channel through which popularisation is diffused. The media constitute a triangular communication space, a 'meeting point' between scientists, the public, and text producers (BERRUECOS, 2000). The latter are mediators, usually journalists, who master an original technical/scientific language and are able to

'translate' a scientific discourse into everyday language.

However, it must be said that this is quite a reductionist approach of popularisation since it raises a barrier between the scientific community and the audience. Recently, the dichotomy science/popularised discourse has been questioned and new approaches have been established within a perspective that popularisations are not 'ancillary' to the elite of technical/specialised texts (HILGARTNER, 1990). They are rather a process taking place along "[...] an expository continuum [...]" between genres (CLOÎTRE; SHINN, 1985, p. 58). This new perspective is starting a process of convergence, which is taking popularisation from the concepts of 'vulgarization', 'debasement', 'translation', or 'transposition' to a perspective on re-contextualization of scientific content depending on the context (CALSAMIGLIA; LÓPEZ, 2003, p. 141).

Moreover, scientific communication, previously conducted through press, radio and television, is increasingly finding new outlets online. While some sources only create an online version of materials previously published in print, others re-contextualise their texts adapting them to the web format. This is the case of TED talks, a non-profit organisation devoted to the dissemination of 'Ideas Worth Spreading', which constitute an innovation within innovation, as they are a new tool of popularisation that breaches the typical triangularization 'scientist-mediator-audience', bringing scientists directly into contact with their audiences.

Ted talks: a new form of popularisation

In this vein, TED is one of the most successful online producers of popularising videos. TED began in 1984 as a conference dedicated to the dissemination of technology, entertainment, and design, but in 2006 it started hosting videos of the conference talks, eventually becoming a new spoken web-based genre. The videos are provided with a transcription, a translation into a number of languages, a blog and a comment area, giving rise to a phenomenon of genre and modality mixture. Caliendo (2012, p. 101) gives a very useful insight into the nature of the hybridity of TED:

> Their discursive hybridity stems from the fact that they are similar to newspaper articles in that they prioritise results rather than methods (BAMFORD, 2012). Not dissimilarly from university lecturers, TED talks are 'planned speech events' (SALVI, 2012: 75) during which speakers often employ multimedia resources such as visuals, music or filmed extracts. Like conference presentations, TED talks have a limited time slot, which cannot exceed eighteen

minutes. Unlike other spoken dissemination genres such as public lectures, TED presenters display a certain degree of informality and colloquialism in their delivery.

Moreover, TED talks breach the typical triangularisation 'scientist-mediator-audience', bringing scientists directly into contact with their audiences. From this point of view, it is very interesting to analyse the process that re-contextualises a scientific speech into a TED talk presented by its own author, without the use of an external mediator.

Consequently, current study will analyse how legal issues are dealt with in the framework of TED talks through a contrastive analysis between a TED talk and its not-popularised equivalent.

The choice to focus on legal discourse is not fortuitous, as legal language is one of the areas that most create a separation between specialists and laypersons, and also because the improvement of legal issues is one of the biggest challenges of our time.

Corpus and theoretical framework

This paper presents a single case study retrieved from a corpus elaborated for a departmental research project of the Department of Modern Philology of the Federico II University of Naples (Italy), and headed by Giancarmine Bongo. The talk is part of a corpus of 1386 TED talks presented in English between 2006 and 2012 which were converted to an electronic corpus of about three million words and divided into five macro-areas: Arts and Design, Education and Culture, Science, Politics and Global Issues, Business. The corpus has been collected for a departmental research project headed by G. Bongo, G. Caliendo and M. Rasulo.

Specifically, this study is based on a contrastive analysis between the TED talk 'HIV - How to fight an epidemic of bad laws', by El-Feki (2012a), and another speech held by the same author at the 2012 Symposia The Global Commission on HIV and the Law, addressing specialists, in order to illustrate the main characteristics of TED talks as a popularising genre. Drawing upon Aristotle's three pillars of rhetorical persuasion, and Calsamiglia and López (2003), Calsamiglia and Van Dijk (2004), Ciapuscio (2003), Hyland (2010), and Caliendo's (2012) theoretical frameworks relating to popularisation, the paper analyses the strategies used to establish the *ethos* of the speech by proposing a topic as credible and morally worth of spreading; *pathos*, by creating a direct emotional contact with the public involving it at a personal level; and *logos*, by investigating

through a close analysis of the linguistic elements used for the re-contextualization of the scientific discourse into a popularised speech.

In the very effective TED talk under examination, El-Feki (2012a) argues for the repeal of ineffective, discriminatory laws that are fuelling the spread of HIV. The speaker claims that governments should embrace laws that protect people living with HIV and those at greatest risk, to reduce new infections.

The talk will be compared and contrasted with a presentation by the same speaker at the 2012 Symposia 'The Global Commission on HIV and the Law'. Similar to the TED talk, the speech shows how effective laws may improve the condition of people living with AIDS but also how punitive laws and practices hinder effective responses to HIV.

The comparison between the two presentations helps highlight the new paradigms according to which popularisation means reconstruction, not re-encoding, of specialised knowledge (CALIENDO; BONGO, 2012), and the direct contact between the scientist and the public, devoid of the typical triangularisation scientist-mediator- audience, confirming TED talks as a new field of analysis.

Analysis of *ethos*, *pathos*, and *logos* applied to 'hiv - how to fight an epidemic of bad laws', by El-Feki

Rhetoric, the *ars bene dicendi*, has fascinated mankind since its first development in the fifth century B.C. (REICHELT, 2012).

Nowadays, rhetoric is considered more than an art,

> [...] a theory about the coherent use of verbal and non-verbal means of communication to persuade and convince receivers of the appropriateness of the speaker's attitudes, beliefs and actions (BURKE, 1969, p. 43).

Rhetoric has become a fully developed theory of argumentation grounded on the pragmatic level of communication, and it is widely applied in legal practices.

In his 'On Rhetoric', Aristotle (1959) explains how during a speech persuasion can be achieved by means of *ethos, pathos* and *logos*. In the case of *ethos*, persuasion is achieved by the speaker's personal character when the speech is so spoken as to make us think him credible. Persuasion may come through stirring the audience's emotions (*pathos*). It may also be affected through the speech itself when we have proved a truth or an apparent truth by means of the persuasive arguments suitable to the case in question (*Logos*).

The following paragraphs will proceed with the linguistic-discourse analyses of El-Feki's (2012a) TED talk contrasting it with her presentation held at the Symposia on HIV.

Pathos in El-Feki's TED talk

An appeal to pathos causes the audience to respond emotionally to an issue and to identify with the speaker's point of view, creating a connection between the two parties. For this reason, pathos is a very powerful tool since it may be used to move the audience to decision or action.

Perhaps, the most common way of conveying a pathetic appeal is through storytelling, because it turns abstractions into something palpable and close to the audience.

Pathos is part of El-Feki's (2012a) talk from its very beginning. In fact, quite surprisingly, the talk starts with the narration of a story in the form of a fairy tale. This incongruous and unexpected incipit evokes surprise in the audience. As Caliendo (2012) has noticed, incongruous gambits are typical of TED talks in general, as this strategy captures the audience's attention to resolve how this surprising element fits with the rest of the presentation:

> Let's begin with a story. Once upon a time -- well actually less than two years ago -- in a kingdom not so very far away, there was a man who travelled many miles to come to work at the jewel in the kingdom's crown - an internationally famous company. (EL-FEKI, 2012a, p. 1).

This incipit introduces the reader into a scenario (BRÜNNER, 1997) by using fairy tale language. The strategy has the objective of projecting the listener into the topic of the talk, but appealing to his inner childhood world of fables. We realize that it is only a strategy used to explain something related to the real world as she makes precise temporal reference ('actually less than two years ago').

Moreover, the name of the kingdom is not revealed, but the visuals show the African area on the map. As a matter of fact, the story - as well as the entire talk - is accompanied with very captivating visuals, which open many more emotional pathways than her words alone. Videos, pictures, graphs and other animated visuals are an integrated part of the talk, giving more strength to the entire presentation.

As the narrative continues, the scenario is disclosed following Propp's fairy tale functions, especially the element of trials and proofs, and each new trial is introduced by the anaphoric repetition of the adversative conjunction 'but':

> Now this kingdom had many resources and mighty ambitions, and mighty ambitions, but the one thing it lacked was people. And so it invited workers from around the world to come and help it build the nation. But in order to enter and to stay these

migrants had to pass a few tests. And so it was, our man presented himself. But then something unexpected happened (EL-FEKI, 2012a, p. 1).

By the end of the story, El-Feki (2012a) slowly guides the audience from the fairy tale world to reality. The unhappy ending introduces the audience to the issue of wrong legislation on HIV as a violation of human rights:

> The medical personnel who took blood samples from the man never actually told him what they were testing for. He wasn't offered counselling before or after the test, which is best medical practice. He was never informed of the results of the test. […] He was released, but then a day or two later, he was taken to the airport and he was deported. What on Earth did this man do to merit this treatment? What was his terrible crime? He was infected with HIV (EL-FEKI, 2012a, p. 1).

The two rhetorical questions closing this part, containing the negative evaluative adjective 'terrible' [crime] catapult the audience back to the real world, triggering emotions.

Once the audience's attention and feelings have been captured, the speaker may introduce the topic of the talk, i.e. the concrete effects of legislation relating to HIV and the immorality of these laws:

> The kingdom argues that its laws allow it to detain or deport foreigners who pose a risk to the economy or the security or the public health or the morals of the state.
> But these laws, when applied to people living with HIV, are a violation of international human rights agreements to which these countries are signatories.
> But you know what? Matters of principle aside, practically speaking, these laws drive HIV underground (EL-FEKI, 2012a, p. 1).

It must be said that pathos is also an appeal to the audience's sense of identity, its self-interest apart from emotions: especially powerful are devices that create an identity between the speaker and the audience so that the speaker almost seems to be the audience addressing itself.

As a matter of fact, after telling the story and introducing the topic of her talk, El-Feki (2012a) establishes her first explicit contact with her audience through the technique of personalisation and establishment of a common ground (CALIENDO, 2012).

The topic of the TED talk is presented as an issue of common concern when the speaker asks a personal question:

> Time for a quick show of hands. Who here has been touched by HIV -- either because you yourself have the virus or you have a family member or a friend or a colleague who is living with HIV? Hands

up. Wow. Wow. That's a significant number of us (EL-FEKI, 2012a, p. 1).

This question involves the audience concretely and personally. The result of the hand-raising reveals that most of the audience is concretely touched by the issue. Avoiding being disrespectful of the audience's privacy or threatening their positive face (BROWN; LEVISON, 1987), she does not ask who of them has HIV, but rather who was touched directly or indirectly by the virus. The use of the inclusive pronoun 'us' in 'that's a significant number of us', creates a sense of unity in the group, breaching the usual speaker/audience barrier.

Moreover, as mentioned before, through the aid of visuals and her physical position on stage, the speaker, with great success, models her emotions with her delivery techniques, magnifying emotions by matching her vocal delivery and gestures to her emotions. First of all, it is interesting to note the elimination of physical barriers between El-Feki (2012a) and the public. This enhances her connection with her audience. For the entire talk, she is never behind the lectern and she constantly moves closer to the audience.

Her tone, volume, and pace mirror her emotions. She uses a loud voice when conveying anger for 'bad' legislation. Sadness is conveyed through a softer voice when introducing the videos of examples of people experiencing the consequences of 'bad' legislation. Frustration is expressed through sighs and hand gestures.

These elements convey the sense of a person integrated with her emotions, giving greater strength and credibility to her speech.

Finally, also stance or evaluation plays an important role in the speech. According to Caliendo (2012), in TED talks, speakers demonstrate their affective responses to the topic and try to engage the public by using adjectives such as 'great', 'good', 'important', and 'better'.

In this talk, the main evaluative adjectives are: 'bad' (8 occurrences), 'good' (5 occurrences), 'terrible' (4 occurrences) 'vulnerable' (5 occurrences) and 'tragic' (1 occurrence).

By expressing a positive or negative evaluation, she anticipates the audience's reaction and emotions and therefore triggers engagement and response.

Contrast with *pathos* used in the symposia presentation

The importance of pathos of the TED talk emerges strikingly when it is compared with the presentation held by El-Feki (2012b) at the Symposia.

This second speech is delivered in a plain, monotone way, and it is completely delivered behind a lectern. There are only a few moments in which the delivery tone changes, for instance, when she discusses the aim of the Commission on HIV: "It has to stop! Forced sterilization and forced abortion of women living with HIV has to stop!" (EL-FEKI, 2012b, p. 1).

While the TED talk is full of personal experiences that arise the appeal to pathos, in the second speech there is only one reference to direct involvement in the issue:

> I personally have friends who have suffered from sexual assault within marriage in Egypt; when they go to the police they are told why are you bothering us with this? [This] is a private matter. Go home (EL-FEKI, 2012a, p. 1).

She also refers to forced sterilization and abortion of women with HIV as a 'phenomenon':

> But frankly one of the most shocking things I heard I was completely unaware of the phenomenon before I joined the commission was forced sterilization and abortion of women living with HIV (EL-FEKI, 2012b, p. 1).

She then introduces a video, the one about Dongo and Helma's experience also used in the TED talk, but this time the video is not commented on.

However, the most striking element of the presentation is the speaker's emphasis on placing a separation between 'her' part of the world and the audience, from the very beginning of the presentation:

> I'm going to begin with a caveat, although it says on the label the Global Commission […] many of the examples that I'm going to use in my presentation relate to the region I know best, the region I work in which is the Middle East and North Africa (EL-FEKI, 2012b, p. 1).

This incipit may be difficult for a general audience. The disclaimer 'caveat' may not be understood by a general public, and so this sets the register of the speech and the target audience at a specific and specialist level.

There are four occurrences of the expression 'my part of the world' and one 'my country', used to establish her expertise about this area, which raises her credibility (*ethos*). This leads us to the second rhetorical strategy used in this talk, *ethos*.

Ethos in El-Feki's TED talk

According to Aristotle (1959), persuasion is also achieved by the speaker's personal character when the speech is so spoken as to make the audience consider him credible.

It is possible to distinguish an extrinsic and intrinsic ethos. The former refers to reputation given by a person's education, experience, public roles and publications, which qualify to speak on a certain issue.

However, the text and speech in itself, the way it is delivered and its content, always convey an impression of the author's character, giving raise to intrinsic ethos.

The concept is comparable to Hyland's (2010) theory about 'proximity': the writer's control of rhetorical features which display both authority as an expert and a personal position towards the topics of a text.

Drawing upon Aristotle's concepts of ethos (credibility), the speech guru A. Duglan proposes four strategies enhancing ethos: similarity, authority, reputation and trustworthiness:

Similarity is the ability to make the audience identify itself with the speaker; Reputation is the belief in the expertise that the audience thinks the speaker has; Trustworthiness is the ability to be consistent with the message; Authority relates to formal or informal authority that the speaker conveys to the audience.

TED talks use quite unique strategies to establish ethos. In this genre of popularisation, trustworthiness and similarity seem to be more relevant than authority and reputation. As TED talks tend to leverage the scientist-audience relationship, this is not an accident.

Resuming the analysis of El-Feki's (2012a) TED talk, after telling the story and enquiring on the audience's personal experience with AIDS, the speaker does not talk about abstract and far laws related to HIV, but rather to concrete laws as they are 'enforced on the street: "I'm not just talking about laws on the books, but laws as they are enforced on the streets and laws as they are decided in the courts" (EL-FEKI, 2012a, p. 1).

The speaker's credibility is not given by abstract law, but rather from what her audience experiences in everyday life.

The speech goes on by using the strategy of opposites, commenting on the existence of 'good' legislation, which protects and respects people living with HIV, contrasted with laws that are still connected to 'superstition', as during the time of leprosy.

> Now there are laws in many parts of the world which reflect the best of human nature. These laws treat people touched by HIV with compassion

and acceptance. […] Unfortunately, these good laws are counter-balanced by a mass of really bad law -- law which is grounded in moral judgement and in fear and in misinformation, laws which specifically punish people living with HIV or those at greatest risk. These laws fly in the face of science, and they are grounded in prejudice and in ignorance and in a rewriting of tradition and a selective reading of religion (EL-FEKI, 2012a, p. 1).

Risk, prejudice, ignorance, and fear typical of 'bad' laws are opposed to compassion, acceptance, prevention and treatment that characterise 'good' laws.

As previously said, this talk establishes ethos more through trustworthiness and similarity than through authority. In fact, in order to enhance her credibility, the speaker openly claims that she is not there as an authority: "But you know what? You don't have to take my word for it. We're going to hear from two people who are on the sharp end of the law" (EL-FEKI, 2012a, p. 1).

In order to enhance her trustworthiness and connect with the audience, El-Feki (2012a) shows two videos which are visual examples consistent with theory of bad laws.

The first is a video of Nick Rhoades, an American unfairly convicted under the U.S. State of Iowa's law on HIV transmission and exposure – which talks about how the correctional system convinces the convicted that they are 'bad'.

With another example of Helma and Dingo's experience from Namibia, El-Feki (2012a) shows the concrete effects of countries in which the law is flouted, due to the stigma around HIV. In the video, Helma reports that she was forced to HIV testing, sterilized, and then forced to abortion when she went to hospital for a pregnancy check-up. In the very touching story, the woman explains that she was forced to sign the paperwork under labour pain.

Another strategy used by El-Feki (2012a) is the use of statistics. Only after showing concrete life cases, she illustrates some basic data on mortality, accompanied with negative evaluative adjective such as 'terrible' and 'tragic'. However, she also talks about hope, as new infections are decreasing.

The writer then introduces the core problem of her speech, noting that the situation can be changed. She enhances the participation of the audience and introduces reference to the title of her talk, 'an epidemic of bad law':

> […] for the first time in three decades into this epidemic we have a real chance to come to grips with HIV. But in order to do that we need to tackle an epidemic of really bad law (EL-FEKI, 2012a, p. 1).

Only at this point of the speech, she gives her credentials as belonging to the UN HIV Commission. Using war lexicon, she claims that the commission is trying to make law an 'ally' rather than an 'enemy':

> It's for this reason that the Global Commission on HIV and the Law, of which I'm a member, was established by the agencies of the United Nations – to look at the ways that legal environments are affecting people living with HIV and those at greatest risk, and to recommend what should be done to make the law an ally, not an enemy, of the global response to HIV (EL-FEKI, 2012a, p. 1).

As noted by Caliendo (2012), quite surprisingly, TED speakers rarely introduce themselves or give their credentials at the beginning of the talk to give legitimacy to their claim. In our speech, credentials have been introduced only at the middle of the presentation, way after the establishment of a common ground of finding a solution to a global and yet close and personal issue. Therefore, the speaker focuses more on the establishment of an 'alignment' (GOFFMAN, 1981) with the audience, with a reduction of "[...] overt markers of hierarchy and power [or knowledge] asymmetry […]" (FAIRCLOUGH, 1992, p. 203).

This takes us to the analysis of audience engagement, which concerns the way speakers address their audience, acknowledge their presence, connect to them at different levels and involve them as discourse participants (HYLAND, 2010). In the TED corpus, this is mainly achieved by means of personal pronouns. In El-Feki's (2012a) speech in particular, the use of inclusive 'we' is prevalent: there are fifteen occurrences of inclusive 'we', which creates a connection between the speaker and the audience, and one occurrence of an exclusive 'we' to indicate a connection between El-Feki (2012a) and the UN HIV Commission. Excluding the occurrences contained in the videos, the pronoun 'I' is used only once by the speaker. 'You', with fourteen occurrences, is not used in an exclusive way, rather to give authority to the public (e.g.: 'But you know what? You don't have to take my word for it'.)

She then gives other data, but reporting the results rather than mere numbers. She uses statistics only to demonstrate that there are possible solutions to the issue:

> At the Global Commission, we have studied the evidence, and we've heard the experiences of over 700 people from 140 countries. And the trend? Well the trend is clear. Where you criminalize people living with HIV or those at greatest risk, you fuel the epidemic. Now coming up with a vaccine for

HIV or a cure for AIDS -- now that's rocket science. But changing the law isn't (EL-FEKI, 2012a, p. 1).

Ethos in El-Feki's symposia presentation

Analysing the speech held at the symposia, it is interesting to note that ethos is way more explicitly established. The speaker does not need to claim that she is part of the commission, as that was already said by the chair that introduced her, but already from the incipit she claims her belongingness to the part of the world she works with: "[…] I'm going to use in my presentation relate to the region I know best, the region I work in which is the Middle East and North Africa" (EL-FEKI, 2012b, p. 1).

A main characteristic of this speech is the number of references to other conferences, laws, studies and bibliography. These not only stress her belongingness to the commission, but also reinforce her credibility. This element is typical of academic/scientific presentations, which require an effective and convincing number of references and data. For instance:

> […] in particular if some of you are interested in learning more about women living with HIV and the legal dimension of that in the Middle East and North Africa I direct your attention to a report presented at this conference, it's 'Standing up and speaking out - Woman and HIV in the Middle East and Africa'. […] The sub-Saharan protocol: all the right words about the rights of women to property and inheritance to any other economic rights and yet the problem around marriage and inheritance are fuelling gender inequality (EL-FEKI, 2012b, p. 1).

As done for the TED talk, also in this case we examined the use of pronouns. There are twenty occurrences of the personal pronoun 'I', mainly establishing ethos; there are twenty-seven occurrences of the pronoun 'you'. They apparently all refer to the audience, but actually they seem to be more considered as a dummy subject, an impersonal addressee. There are sixteen occurrences of 'we', equally divided between seven occurrences relating to the commission and thus excluding the audience, 7 occurrences of an inclusive 'we', and two occurrences relating to Egypt, to which the occurrences of 'my part of the world' should be added. For example:

> Finally I would like to say that as we were on the commission we were looking at the law as it could affect global response to HIV but in many parts of the world we also need to think how HIV can affect the law and it occurs to me that in our region and in many parts of the world (EL-FEKI, 2012b, p. 1).

Thus, in this case, ethos is more established through authority and reputation rather than though similarity, as typical of scientific and academic discourse, with abundant data and references.

Logos in El-Feki's TED talk

The last pillar of Aristotle's rhetoric is related to the appeal to the readers' sense of logos.

Logos is frequently translated as the 'logic or reasoning', the ability of using argumentative skills, but it originally referred to the actual content and organisation of a speech. The overall language choices and organisation of a speech are used by the writer to guide the audience towards a logical conclusion of convincement and persuasion.

In El-Feki's (2012a) talk, as well as TED talks in general, the elements related to this appeal are quite scattered along the whole text. This is also true for the aims of the text. As Caliendo (2012) has noticed, while research articles tend to place the main claim towards the end of the text (HYLAND, 2010), in written popularising genres (NWOGU, 1991) it is generally found at the beginning. In oral popularisation speeches such as TED, the main claim is positioned neither at the end nor at the beginning of the text, but rather revealed while the interaction between the speaker and the audience is created in the popularising process.

In El- Feki's speech, visuals play a main role in appealing to the audience's sense of logos. She uses exemplification strategies which, along with the initial scenario, help the speaker give arguments to her speech. For instance, when speaking about countries with bad laws and the way that better laws can influence the reduction of HIV, she gives the example of people at risk:

> Let me give you just one example of the way a legal environment can make a positive difference. People who inject drugs are one of those groups I mentioned. They're at high risk of HIV through contaminated injection equipment and other risk-related behaviours (EL-FEKI, 2012a, p. 1).

As already mentioned previously, the speaker reveals a great mastery of logos by means of visuals. Her diagrams are all very clear and intuitive; they help the audience understand every sequence and process, in a meaningful sequential order. Her carefully crafted and focused diagrams almost always enhance the comprehensibility of the speech using progressive disclosure.

Furthermore, throughout the text, we have seen how the speaker uses some 'illustration procedures' (GÜLICH, 2003; BRÜNNER, 1997) to re-contextualize her scientific discourse into a

popularised situation, giving further argumentative strength to her speech.

The speaker also uses various forms of 'metaphorical language' (metaphor in the narrow sense, as well as comparison and analogy). For instance, a great analogy that the speaker uses is the analogy between the isolation generated by AIDS and leper during the seventeen hundreds, accompanied with an image of a leprosarium:

> Today we can prevent the transmission of HIV. And with treatment, it is a manageable condition. We are very far from the days when the only practical response to dread disease was to have banished the afflicted -- like this, 'The Exile of the Leper.' (EL-FEKI, 2012a, p. 1).

The speaker uses several kinds of 'exemplifications', which allow her to express complex concepts in terms of ordinary everyday experience. Using explicit and plain language, when talking about the solutions which could be used to reduce harm risk, she gives some concrete examples to let her audience understand the issue:

> So for example, outreach workers who are distributing condoms to vulnerable populations are not themselves subject to police harassment or abuse or arbitrary arrest. People who inject drugs are one of those groups I mentioned (EL-FEKI, 2012a, p. 1).

Another strategy she uses is the involvement of her audience. The highest occurrences of 'we' can be found towards the end of her speech, where solutions are summarised. This helps drawing the audience's attention towards the logical deduction that the solution is not far away:

> But there's plenty you can do while that process is underway. […] We can also train judges so that they find flexibilities in the law and so that they rule on the side of tolerance rather than prejudice. We can retool prisons so that HIV prevention and harm reduction is available to prisoners (EL-FEKI, 2012a, p. 1).

Then the speaker draws her moral conclusions:

> The key to all this is reinforcing civil society. Because civil society is key to raising awareness among vulnerable groups of their legal rights. But awareness needs action. And so we need to ensure that these people who are living with HIV or at greatest risk of HIV have access to legal services and they have equal access to the courts. […](EL-FEKI, 2012a, p. 1).

At the end of her speech, the speaker readdresses her audience, making reference to concrete solutions that improve the strength of her arguments, and thus make her overall message more persuasive. She stresses that HIV is not far away and that law should be close to people, not an 'arcane stuff of specialists', in the true spirit of popularisation, appealing to the entire audience through an inclusive 'us':

> For many of us here HIV is not an abstract threat. It hits very close to home. The law, on the other hand, can seem remote, arcane, the stuff of specialists. Laws that treat people living with HIV or those at greatest risk with respect start with the way that we treat them ourselves: as equals. […] Because for those of us who live in democracies, or in aspiring democracies, the law begins with us (EL-FEKI, 2012a, p. 1).

Finally, the speaker concludes using the word 'spread', which is part of the TED acronym, concluding with an energetic call-to-action: "If we are going to stop the spread of HIV in our lifetime, then that is the change we need to spread. Thank you" (EL-FEKI, 2012a, p. 1).

The repertoire of linguistic techniques used to convey her popularised speech triggers her audience to commit and do something to make a change.

Logos in El-Feki's symposia presentation

Looking at the overall structure of the Symposia presentation, its organisation and its main argumentative strategies, it must be said that it follows the typical structure of an academic/scientific presentation. The terminology used belongs to the field of legal language, which might create comprehension issue for a general public, e.g. 'caveat', 'prosecution', 'prophylaxis' and alike.

As regards exemplifications and concretization, compared to the TED talk, there is a limited number of these elements, although the text is full of data and references to reports, laws and studies:

> You can find for example very good national laws and yet there is also customary and religious law which have impact on women's daily life particularly as they are related to marriage and inheritance (EL-FEKI, 2012b, p. 1).

While visuals were a main element of the structure of the TED talk, in this speech these are present, but not part of the video. We understand that she plays Dongo's video and she uses some slides, but we cannot see them. Maybe this choice is not due to the speaker but to the system itself. As typical of conferences, the visuals may be used not only for the audience, but rather to help the speaker for his/her speech.

Simple language is not used as a logos strategy in this second presentation. More simple language is used mainly when referring to solutions, including the use of the inclusive 'we':

[…] so based on all this the recommendations…it's not rocket science here. […] we need to remove immunity from prosecution for rape in particular when the perpetuator is an intimate partner. […] We need to work with communities to enforce that law and part of that working with communities is engaging custodians of religious and customary law […](EL-FEKI, 2012b, p. 1).

The speech ends with a remark on the commission's work and a personal opinion on the correlation between the fight against the HIV epidemics and wrongful legislation:

Finally I would like to say that as we were on the commission we were looking at the law as it could affect global response to HIV but in many parts of the world we also need to think how HIV can affect the law […] so just as the law can be a help and an ally to respond to HIV maybe HIV may be a way forward to have legal reforms in many of these issues experienced by women. Thank you very much (EL-FEKI, 2012b, p. 1).

Also in this case, she talks of law that can become an 'ally', using war terms to fight the war against AIDS.

Final considerations

The comparison between EL-Feki's (2012a) TED talk and her presentation at the Symposium (2012b) strikingly highlights the main characteristics of oral popularising texts and in particular of the innovative form of TED talks.

Referring to Aristotle's pillars of rhetoric and to the recent studies on popularisation, it has been said that TED talks - and popularising discourses in general - should be seen as re-contextualisation rather than as translation, because they use talk or text drawn from a context to make formulations available in another (CIAPUSCIO, 2003), subverting the traditional, reductionist approach that places a barrier between the audience and the scientists. These talks are not characterised by the typical triangularisation scientist – mediator - audience, so a main role is played by proximity and re-contextualisation.

The first element analysed, *pathos*, has revealed that the TED talk is highly loaded with pathos, conveyed through stories, videos, pictures, graphs and other visual media. These open many more emotional pathways than words alone.

The uses of negative and positive evaluative adjectives and the direct engagement of the audience through personal questions, create an identity between the writer and reader so that the speaker almost seems to be the audience addressing itself.

Also her physical position on stage, the elimination of the lectern, and her delivery techniques, magnify emotions and convey the sense of a person integrated with her emotions, giving greater strength and credibility to her speech.

In the second presentation, the speaker uses a plain, monotone voice, and it is completely delivered behind a lectern. There are only a few moments in which the delivery tone changes, for instance when she points out her main aims.

The most striking element of the speech is the speaker's emphasis on placing a separation between her 'part of the world' and the audience. Though belonging to the specific genre of scientific presentations, it must be said that this does not help the speaker's appeal to pathos.

As concerns the analysis of ethos, in the TED talk, trustworthiness and similarity seem to be more relevant than authority and reputation. In order to enhance her trustworthiness, El-Feki (2012a) uses videos which are visual examples consistent with theory of bad laws. Only after the first half of the speech, she gives her credentials, as belonging to the UN HIV Commission. Thus, the speaker focuses more on the establishment of an 'alignment' (GOFFMAN, 1981) with her audience, than of authority.

On the contrary, a main characteristic of the symposia speech is the number of bibliographical references. These not only stress her belongingness to the commission, but also reinforce her credibility. Moreover, there is a high presence of statistical data scattered all over the text. This figure is typical of academic/scientific presentations, which establish ethos more by authority and expertise than through similarity.

Finally, as far as logos is concerned, through an informal speech, El-Feki (2012a) uses several techniques to organise her text in a coherent, cohesive and convincing way. She uses exemplifications and metaphorical language, which along with the initial scenario help the speaker give arguments to her speech. Revealing a great mastery of logos by means of visuals, her diagrams are all very clear and intuitive, and this enhances the comprehension of the speech.

The symposia speech instead follows the typical structure of an academic/scientific presentation. The terminology used restricts the possible audience of the text, as it belongs to the field of legal language, which might create comprehension problems for a general public.

Apart from the topic, maybe the only similarity between the two texts might be the issue of the 'battle' against the HIV epidemics and wrongful legislation. As a matter of fact, in both cases she talks of law that can become an 'ally', using war terms to fight the battle against AIDS.

Finally, while the second speech is rather the informative presentation of the results of the activities directed by the HIV Commission, the TED talk is quite a particular case. In fact, as in other TED talks (COMPAGNONE, 2013), besides merely disseminating knowledge about legal issues related to HIV, it also aims at promoting a system of values. The speech is not only informative, but rather proactive, in that the expert is not simply raising awareness of a global issue; she is implicitly creating a need, i.e. finding a solution to this issue, involving the audience in real life.

Naturally, this paper is limited to a single case study, but it does reveal some interesting issues on popularisation analysis.

Research on expert–layperson communication should not only focus on technical terms or terminology, but pay much more attention to conversational methods and to experts and non-experts' roles and to the entire context in which these forms of popularisation are delivered. Moreover, as Bongo puts forward, we are in the presence of a new paradigm, according to which popularisation is taken to mean reconstruction, not re-encoding, of specialised knowledge. In that respect, language becomes the instrument through which knowledge is finally mediated, not merely translated.

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