

‘READVERSATION’: SOME COHESION AND COHERENCE PROBLEMS IN "HYPERTEXT DISCOURSE"

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1. Introduction

In this essay I would like to examine *hypertext discourse* in comparison with other known types of discourse (e.g. conversation, written text, etc.). I assume that the reader of my paper already knows what discourse is, and what cohesion and coherence in written and spoken discourse are. In this paper I want to claim that hypertext discourse is different from all previous known types of discourse, since it combines conversation and reading while the reader is also the author of the conversation he is in.... (Confusing? Well, very..!)

The compound word – *readversation* [ri:dvə'seɪʃn] - used here to describe the act of hypertext discourse is made out of two words: *reading & conversation*. Since the morpheme {con-} in the word "conversation" means "mutual" and involvement of more than one participant, it does not describe a situation where there is only one active participant. On the other hand the word "reading" does not accurately describe navigation between different texts and ideas, which is the essence of hypertext discourse. It is true that unlike real conversation there is no turn taking in this type of discourse, but the associative and "unruly" navigation is very similar to what is happening in a friendly conversation. Even the choice of words is similar to that of conversation. Other names invented for the purpose of describing hypertext discourse and which are mentioned in Landow's book [8] are: "*docuverse*" and "*infoworld*".

Hypertext was and is studied by many scholars from the aspects of education, psychology, computer programming etc. But as far as linguistics is concerned I could not find many articles. The articles I did find appear mainly on-line in the Internet. Since writing a paper in the Internet facilitates access to those articles I tried to link them to my paper in the appropriate places, and obviously they link the reader to other relevant references. I try not to quote other documents which exist on-line because unlike printed

texts, on-line texts are available any time to the reader and it is redundant to type them again.

2. What is hypertext

A good printed paper would probably include an introduction to the applications and usage of hypertext, but in this medium - the electronic medium - there is no need to redefine terms every time we use them. It is enough to link the reader to a site which specializes in these aspects, and to concentrate on what the paper is really about. The reader, on the other hand, can then choose whether he needs this information in order to understand the article, or not.

So I chose some links that might help you better understand the concept of hypertext:

A good university on-line course on hypertext

A guide to cyberspace

Polytexts, hypertexts and other cultural formations in the late age of print

Hypertext Book: state of the art review of hypertext.

The hypertext revolution

Hypertext: Resources

Bibliography of hypertext

3. The History of hypertext

The term "hypertext" was coined in 1965. But the idea behind this concept was put into writing in July 1945 in an article called "As We 'May Think" by Dr. Vannevar Bush [10]. Bush was the director of the American Office of Scientific Research and Development during World War II. Dr. Bush named his associative word links - "memex". The idea behind the "memex" was to create a central electronic archive that would gather information in the form of on-line associations from all the scientists that could contribute to a given subject, directly or indirectly. And then to use it to solve complex problems that the information held by one expert in their field was not sufficient because it did not cover enough aspects. The name of the article sums up the idea behind those associations -

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this is the ultimate way of thinking - the most productive way for humanity to come up with more new and original ideas.

This idea was taken as science fiction at the time and we cannot claim that it is all understood today. It was only twenty years later (1965) that another scientist took the idea and tried to build up this world out of infinite pieces of information linked to one another by key words. This scientist is Ted Nelson and his project (which was "alive" for 30 years) was named *Xanadu*. Nelson was the one who termed the word "hypertext". There is a good book about Vannevar Bush himself and his invention edited by James M. Nyce & Paul Kahn [10].

At the same time, there are people who claim that hypertext as a concept was a long time before we noticed it. One of them is R. Callahan who is the founder of a Joycean web site called *Work in Progress*. I accept that in our so-called postmodernist decade we are more likely to find the idea of hypertext understandable, but I do not agree with the claim that it was used without the technology of computerized word processing. i.e. without the spatial dimension, or what is now called: being E-literate.

4. The participants in the hypertext "readversation"

In this section of my essay I would like to bring up some questions concerning discourse theory as it applies to other types of discourse in comparison with hypertext discourse. The textbook I am referring to is: D. Schiffrin [13].

The first thing we do when we are involved in any kind of discourse (e.g. reading, conversation, giving a speech etc.) is to ask ourselves: who are the participants, and what is our role in the discussion. Jakobson (1960) referred to the participants as to an ADDRESSOR who conveys some sort of message to an ADDRESSEE (textbook p.33), which means that the discourse has only one direction - from A to B, while B has nothing to do with the actual production of what's being said (I am not referring to B's interpretation, only to the production of the discourse itself !!!). This analysis answers the problem of who are the participants in speech. But it does not apply to hypertext discourse, since it restricts the direction of the discourse from A to B only, while in hypertext discourse the ADDRESSEE is also the ADDRESSOR because he is the one who creates the context.

Erving Goffman (1959;1974;1979) suggests another division between the participants. In the act of discourse there are two sides (textbook pp.102-104) - ADDRESSER which is combined out of an Animator, an Author, and a Principal, and on the other side there

is the AUDIENCE which is also a combination of a Hearer and a Bystander (Overhearer, and Eavesdropper). This theory also claims that the discourse has some sort of a defined direction - from A to B. But the idea that the two sides within themselves are combined out of other functions is a little bit closer to the notion of participants in hypertext discourse.

As I mentioned earlier in hypertext discourse the direction of the conversation is not from A to B, because B is the actual creator of the discourse. It is B who sets the sequence of the text, and thus the context of the reading. I can adapt Goffman's theory to fit my understanding of this reader - author pattern: There are no sides but several reaction chains: there is the Thinker (Principal) who has an idea. There is an Author who develops it. There is a Typist who writes it down. There is an Animator who puts the computer on, and navigates between the key words. He now becomes a Hearer and a Bystander (with all of its combinations), and then becomes a Thinker again (this is how and why he keeps on navigating).

The pattern of hypertext discourse is dictated by the Thinker. It is true that the actual message is already in the system of the net but since it is immeasurable and there are so many options, the number of possible combinations is infinite, and we can count each deviation to be a new conversation with a different message. An interesting article about the subject available on-line is: "*Production and Consumption of Meaning: The interplay between subject and object in open hypertext representation.*"

In her article, Davida Charney [3] describes this change in the role of the author as follows:

".. for readers to make appropriate connections between related ideas, the sentences expressing these ideas should appear in close proximity. Thus a text is easier to read if its points are developed in coherent sequences of sentences, paragraphs, and sections and if it contains discourse cues that signal the relations among these ideas.... Since readers use high-level ideas to tie portions of text together, these concepts should be explicitly stated early in the text and should be clearly signalled so that the reader can easily recall them as the need arises.... Thus it is easier to read, comprehend, and remember a text if it contains an informative title, headings, overviews, and topic sentences introducing key concepts that are repeated and developed in successive portions of text... These strategies, however, place the burden of selecting and arranging information, and providing signals to the arrangement, primarily on the writer. Hypertexts, by shifting a large portion of this burden to the reader, by proliferating the readers' choices about what portions of a text to read and in what order, compound the difficulties of creating a coherent mental representation." [3, p.245]

P. Whalley [16] suggests to place reader-author relations on a continuum:

Reader Control: little cohesive reference

|
reference manual

|
encyclopaedia

|
course reader

|
distance teaching text

|
Author Control: much cohesive reference

He also says that "the amorphous 'links' provided by hypertext do not provide any true cohesive reference. If everything is related to everything then essentially no cohesion is provided." [16, p.11 - 12]

On the basis of these claims I want to suggest a simplified model of the way hypertext "readversation" is conceived. If we separate each unit of text, without its links, it will "behave" according to printed text rules, and it will have a particular author. But when we put the links into the text it "behaves" according to different rules. As an analogy to this I can say that, in a hypertexted text, the text itself is a building brick, the hypertext is the cement, and the "readversation" itself is the building. Now, the manufacturer of the brick (the author) is not responsible for the building, but only for the brick he manufactured. The only one responsible for the building is the one who builds it, i.e. the reader. Hypertext discourse is the analogue of this building and this is why it differs from printed text: it is not measured according to one author but usually according to the ability of one reader to navigate within a given time.

5. Beginning? Body? End?

When we think of a conventional discourse it is always defined with a beginning, a body and an end. If it is a conversation it begins with the first human sound or gesture and it ends when the sound or gesture stops (more or less so). But in hypertext discourse there is never an end, and, in most cases, the participant begins the "readversation" *in medias res*.

When we take a book from the shelf and start reading it, we can always 'jump' to its end to see what has become of the hero, or what is the answer to the riddle, but after doing that we know that there is no other end to this book! And that even if we keep on reading from where we were before, the end will remain the same, and in the identical place where it was before. In other words the size and content of the text would be the

same. In hypertext discourse the dimensions of the text are not defined since the links are part of the text and the links themselves include are also part of the original text, etc. Let us take this text - where we are - as an example:

If you choose to click the next hypertext, which reads: *newspapers from all around the world/economic articles* you would probably get 'an enormous amount of other texts and contexts (i.e. huge amount of discourses). Well, I can now claim that these other texts and contexts are part of my text and context and therefore of this hypertext discourse. I can now speak of a printed text as a unit that has textual integrity, and of a discourse in hypertext as many sub-units having no textual integrity. Landow [8] relates to this issue, specifying that: "Another related effect of electronic linking [is that] it disperses "the" text into other texts. As an individual lexia loses its physical and intellectual separation from others when linked electronically to them, it finds itself dispersed into them. The necessary contextuality and intertextuality produced by situating individual reading units within a network of easily navigable pathways weaves texts, including those by different authors and those in nonverbal media, tightly together. One effect of this process is to weaken and perhaps destroy any sense of textual uniqueness" [8, p. 53; for a more elaborate discussion about this interesting aspect see pages 57-59 of his book].

6. Basic world knowledge

When reading text or taking part in any kind of discourse - even conversation with a cash machine - we assume that the participants have certain basic world knowledge. In this section of my article I would like to show that hypertext "readversation" requires a different, very basic, fact of world knowledge that other types of discourse do not.

Since we have seen earlier that there are no defined borders to the hypertexted text, the participants should assume that they are getting into a place they have never seen before and that there will always be a notion of *in medias res*. This feeling of no boundaries is very confusing sometimes and the participant should know that it is very easy to actually get *lost in hyperspace*. The notion that there is an almost infinite number of documented information linked directly or indirectly to your hypertexted text is very new to the average participants and the idea is even fantastic for many. You can never find everything although you should know that everything is in there somewhere!

Let's take the *internet guide to hostelling* as an example of what you can find in my text. You can find everything you can think of relating to travelling under this small blue title, and if this is not enough you can

always look it up yourself. And all of the information you need would pop-up onto your screen. This revolution in thinking is found in the fact that it is all available to you and you should only know how to look and what to name the information needed - so that it would appear on your screen.

The direction of the navigation is also new knowledge, as J. Johnson-Eilola [7] puts it: "readers do not read top to bottom across a page and front to back from page to page, but according to a path they navigate through a network of text nodes." [7, p. 197]

However, there is a problem with this flow of knowledge: one can never know its real source. Since there are many users connected to the same net, and any one of them can create a document of their own, it is very likely to find many documents containing incorrect information! e.g. *Wordz Dictionary* contains words which the users defined for it, and you can never know if the user is credible or not. But on the whole, if the participants know these basic facts they have nothing to be afraid of since they can always use sources they know to be reliable. In the next sections I would like to illustrate other aspects of this revolution, but I think that these aspects are the most important ones.

7. Hypertexted words

The first thing we see when we open a hypertexted text is the highlighted words, usually in blue. In this section I would like to study those words in relation to their grammatical and structural functions. Since this medium is basically very close to a spoken conversation, people tend to mark words as hypertext as if they are speaking the words; e.g. they omit determiners, prepositions, and even verbs - something 'inappropriate' in written language. Some individuals even use the words 'here' and 'there' as if pointing with their finger, as if saying: "My text is a world of its own, and you are in it". These links do not suggest what's behind them, and sometimes, as we shall see, they create coherence problems (e.g. schemata). Here is a text explaining *how to choose words for hypertext*.

Look at the hypertexted words in the site of the *Banned Books*. Whenever a name of an author is followed by the name of his book only the name of the book is hypertexted. When the hypertext is a name of a book it is grammatically correct - no omissions, no deletions. When the hypertext is part of a sentence that does not refer to a book, as if in speech, it is ungrammatically highlighted, usually without the determiner. We can see the same phenomenon in another language: in French, the determiners and the prepositions that end with a vowel become clitics when followed by a noun which begins with a vowel. It is very reasonable to

think that a clitic is less likely to be separated from the noun it is leaning on even if it is not an integral part of the name. But let's look at *Asterix' site* where the same rule applies. And thus I can conclude by generalizing, saying that whenever the hypertext is a quotation it will be highlighted as if it appears in correct and grammatically written language. But when the hypertext is not a quotation and it is a part of a sentence it will be highlighted as if it were spoken language. i.e. the author may omit parts of the phrase - but not the noun.

If there is a verb within the hypertexted words it is usually in the imperative. I think that this phenomenon reinforces my division into written and spoken language since the imperative is generally used for instructions - which is the case here - such as in guide books and in informal conversation, but not in other more formal methods of communicating. And thus I can conclude that the language used on the net tends more often to imitate the spoken language and not the written one.

Gray [6] brings up a problem concerning the semantic meanings of the words chosen as links: "Competency is demonstrated in everyday life through agreed-upon meanings of the words that can be used to create information categories. Words and categories are seen as not continually subject to negotiation. Nevertheless, there can be a great deal of ambiguity and actors may not share with the hypertext an assessment of what data can be found in which category. Such ambiguity may not become visible until the interaction becomes troubled. Until then, shared meanings are assumed." [6, p. 630] For a more developed discussion on this subject see the next section.

8. Indexes - putting some order into this chaos

Since our mind does need a certain amount of order, and since there are technical limitations to the length of a written section, there is a tendency to use tables of contents and indexes at the beginning of sites. In this section I would like to look at some indexes and to examine the reasons for having such indexes.

As you can see on your screen there are some buttons on the toolbar which help you navigate from document to document e.g. Back, Home, Forward, and also GO, Bookmark, Net Search etc. and on the menu, buttons that help you navigate within the document you are currently reading e.g. Find. The GO menu lets you go back nine URL (Uniform Resource Locator) addresses back. It is designed so in order that it would resemble the actual short-term memory capacity of our brain (7 ± 2 items back). Since there are more than nine links in an average document the Bookmark was invented. It allows the participant to save as much URL's as he

wishes to, so that he can create a small known path through the web.

There are also technical constraints that allow the reader to see only a portion of the document at a time (usually a 14" or 17" screen). And thus it is not efficient to read a 300 pages book in one piece i.e. to scroll the screen along 60 or so meters of text! And therefore, in order to put some order in this mess, each text is divided into many small sections that allow the reader to navigate between them. Shneiderman [15] says in his article that: "A major concern to authors of hypertext databases is determining the optimal length for documents. Research suggests that many short documents are preferable to a smaller number of long documents. An experiment was performed at the University of Maryland using the Hyperties system in which the same database was created as 46 short articles (from 4 to 83 lines) and as 5 long articles (104 - 150 lines). Participants in the study were given 30 minutes to locate the answers to a series of questions by using the database. The 16 participants working with the short articles answered more questions correctly and took less time to answer the questions." [15, p.126]

Carlson [2] partially limits this theory by saying: "...not all texts are suitable for hypertext representation. Hypertext makes the deep structure of a knowledge domain explicit... Although there is no universal model for hypertext implementation, experience suggests that if the document is closely interwoven through rhetorical devices, then decomposition into chunks and links will be difficult, with loss of information and confusion of meaning of a potential result. For some documents, this conversion is either impossible or not desirable because it destroys the subtle interconnections of theme, argument, metaphor, and word choice." [2, p.63]

Moreover, now, since there are many more related documents to look for, and since we can read those sections in any sequence we may choose, the chaos is even greater. So what can the participant do? Well, tables of contents are a very ancient invention, but with the help of hypertext they become very useful. Let's look at *Dr. Seuss' Home Page*. As you can see all of Dr. Seuss' writings are highlighted in blue, while the author of this page presupposes that the reader knows all of Dr. Seuss' work, or that s/he will look into each and every one of the titles to see what's behind them.

Another example of the use of index or table of contents is the *Home Page of Felix the cat*. Here you can see a hypertexted index surrounded by text. To each of the highlighted words an explanation is attached, and the author does not presuppose any knowledge about the specific cartoons or even about the History of Felix or who he is.

In his book Philip Seyer [14] writes that hypertext can help not only the reader to create a sequence of reading of their own, but it can help the author of the document too, in order to be more creative: "Hypertext gives us the freedom to think and develop ideas before we have worked out a full-blown outline; as a result it increases our productivity. We can create a node that focuses on a topic without knowing (or worrying) where the topic will fit. We can then link this "dangling" node to a control node under a heading such as "Where does it go?" ... " [14, p.84].

But there is a problem with hypertexted indexes, as we can learn from an experiment conducted by D. M. Edwards & L. Hardman [5] who gave three hypertexted multiple sectioned documents: one was arranged in hierarchy i.e. links were made only to previous and next sections; the second was arranged in a mixed order i.e. both hypertexted index and links within each section; and the third linked its sections only through an index. They had several conclusions. Concerning the placement of a certain subject as a hyponym of another they write: "...DANCE was actually within the category of SPORT, but could equally have been in ENTERTAINMENT or LEISURE. Thus the general area in which the answer could be found was not obvious, and possibly did not conform to the expectations of the subjects. This emphasizes the problem of categorizing hierarchical structures and also illustrates the influence that hierarchical categories have on users' conceptual models and their expectations of the probable contents of those categories." [5, p.121].

Another conclusion was that: "The subjects in this study who used the mixed hypertext frequently used the index available in the following way: Firstly they would access a general area of the document, e.g. cinema, which they would then explore using the hierarchy. The index was only used to access a specific screen directly if the user had difficulties in finding it using the other method, or had reached a later stage in the tasks, suggesting that they were more familiar with the document." [5, p.123].

9. Colour Change

One of the new more technical cohesive devices invented especially for hypertext discourse is the colour change. In order to facilitate navigation between documents, the highlighted hypertext changes its colour once it was visited. Furthermore, many times when the same visited URL appears in another not-linked document it also changes its colour.

10. The problem of schemata

In order to define what schemata is I would like to quote from Schiffrin's book [13] where she annotates

her writing saying that: "Despite the difficulties of identifying structural units of discourse, there seems to be a fundamental assumption in all analyses of language, and of social life, that people categorize the world that surrounds and informs them. Such categorizations not only enable people to inform others about that world: they also help people make sense out of what would otherwise be a steady stream of stimuli from sources of information that are often simultaneously available. Put another way, we routinely and automatically segment our environment and relate those segments to one another in ways that capture both their similarities and their differences. There is no reason to expect that we - in our capacity as speakers and hearers engaging in social interaction - stop doing this when we produce and interpret utterances." [13, p.361].

It is true that (as we have seen before) indexes facilitate this search for pattern, but I want to say that it must require a great deal of concentration in order to categorize each and every text in the hyperspace. I find it very hard to believe that this automation or instinct works in hypertext "readversation". It is like playing a game of chess against a room full of people, each playing against you simultaneously! (And there are very few people in our world who, as we all know, can play and win in such conditions). There is an on-line article that claims that there is a scheme according to which people write on the net but it refers to academic writing only. The article is called: *Abductive Multiloguing: The Semiotic Dynamics of Navigating the Net (1993)*. This article, written by G. Shank, argues that "Net communication is neither oral nor written, but semiotic." In an article by Samarapungavan and Beishuizen [12] it is reported that an experiment performed on two groups, one reading a linear (sequential) text and the other an encyclopaedic non linear text, has shown that "all the subjects in the encyclopaedic condition mentioned that they found their reading condition to be very difficult and tiring." But it is important to note that this "non-linear conditions" group performed significantly better than the other "linear conditions" group in the reading comprehension and on the inferential reasoning tasks.

Charney [3] brings up the subject with less certitude. After writing that "the easiest texts to read are those based on a familiar structural pattern or genre" [3, p.245], she goes on to say that: "... once a schema is invoked, information in the text that fits the pattern is integrated easily, but information that seems peripheral or incongruous tends to drop out - either it is never linked to the mental representation of the text or, if it is encoded, the link to it is so weak that it effectively is lost... When texts set incoherent expectations or fail to confirm expectations they initially raise, they create

problems for readers, especially those to whom the subject matter (or "domain of knowledge") is unfamiliar." [3, p.246] But can it be said that whenever a hypertexted text is linked to another text, the reader is creating a whole new understanding of the complex? And, if this is the case, does he really relate to the new text as an integral part of the previous text? I believe that it is not so. Maybe people read the linked text very briefly until they find the spot where the text is relevant or similar, or maybe they look at the links first and only then they decide what to read. But maybe it is part of the new world knowledge readers have to learn: that it is very exhausting to follow all the patterns, and that the real pattern is the lack of it.

A. Dillon, C. McKnight & J. Richardson [4] enumerate the difficulties in categorizing hypertexted texts: "When we open a hypertext document we do not have the same amount of information available to us [as in printed text]. We are likely to be faced with a welcoming screen which might give us a rough idea of the contents and information about the authors/developers of the document but little else. It is two-dimensional, gives no indication of size, quality of contents, age (unless explicitly stated) or how frequently it has been used (i.e. there is no dust or signs of wear and tear on it)... there is usually no way of telling even the relative size without performing some 'query operation'. Such a query operation will usually return a size in kilobytes and will therefore convey little meaning to the average reader... The fact that hypertext offers authors the chance to create numerous structures out of the same information is a further source of difficulty for users or readers. Since schemata are generic abstractions representing typicality in entities or events, the increased variance of hypertext implies that any similarities that are perceived must be at a higher level or must be more numerous than the schemata that exist for paper texts... The current lack of standards in the electronic domain compared to the rather traditional structures of many paper documents is a further problem for schema development." [4, p.182].

Norman Meyrowitz [9] suggests that the pattern or the scheme of the readversation is the links themselves. He suggests a futuristic model of a computerized template saying: "You want to have links set up automatically between different documents, so you can create a class of document that already is prelinked to another class of document, and when you instantiate a class you get an entire web of empty template documents, but with all the links premade. Once we can start doing that, you won't have to manually forge every link that you create, but rather have the system understand some of the inherent linkages between documents." [9, p.308] According to Meyrowitz the pattern is the map that the

links create, and the actual scheme is the path along which we navigate. For this reason he suggests different fixed known maps for different purposes, so that the user could use the links more efficiently.

Because the highlighted words are sometimes used as a pointer, and because these pointers do not supply the sufficient information needed for the reader in order to judge whether or not to click on this link, (e.g. *something nice*) we can say that this situation is analogous to a conversation: (I hold this opinion in spite of what is said by S. H. Gray [6]: "Links that shift topics are inherently difficult to traverse - more difficult than topical shifts in human-human conversation" [6, p.628], since you can never tell exactly what the other person is going to say. Only after the other has said his words and we have understood them do we react - some people are quicker than others...). This is a part of what is called turn taking. So maybe there is a sort of turn taking in the readversation after all: each link is an utterance and the reader is managing the turn taking between them.

11. Marginal ideas become subjects

In this section I would like to discuss the high level of true intertextuality and the possible influence it has on the global coherence of the readversation.

Every time we click a highlighted phrase, the marginal phrase, or the annotation, becomes the subject of the next "utterance". This kind of progression is made as a result of the high level of intertextuality or intersubjectivity that a hypertexted text contains. When I say intertextuality I refer to the allusions a text has which hint at an outside source. There are many definitions that relate to this term, and even many names, but most of them are somehow included in mine. (e.g. see Beaugrande 1985 inter- and intratextuality; and Schiffrin 1994 - intersubjectivity).

When jumping from one association to another, the reader might lose their way between the subjects (see *lost in hyperspace*). This notion may resemble the notion of the lack of coherence in the following sentences: *I want to go home. The home of bird is the nest. The bird has wings. Very light wings can disturb the equilibrium of a plane.* etc. Although each sentence relates, in some way, to the previous there is no actual relation in the level of coherence. I do not claim that the semantic connection between hypertext utterances is so weak, but if we are to move three or four links from a given text, we may find ourselves in very different surroundings. Or, in other words, as R. Rada [11] puts it: "If a semantic net represents an abstraction of the network of text and a traversal of this net produces a linearized text, then this network structure

can be directly related to the cohesiveness of the linearization. If the traversal goes from node X to a node directly connected to node X, then the associated text should seem related or cohesive. If the traversal goes from node X to a node that is several edges distant from node X, then the linear cohesiveness will seem less." [11, p.62].

Landow [8] describes the phenomenon as "de-centering": "As readers move through a web or network of text, they continually shift the center - and hence the focus or organizing principle - of their investigation and experience. Hypertext, in other words, provides an infinitely re-centerable system whose provisional point of focus depends upon the reader, who becomes a truly active reader in yet another sense." [8, p.11]. It is very similar to what we experience in a friendly - gossip conversation, but in hypertext discourse the pace of moving from subject to subject is much greater.

12. Conclusion

In this paper I have tried to describe a new discourse pattern - the readversation. There are many subjects I did not relate to and which should be studied, such as relevance theory and hypertext discourse; words used in URL's; specific kinds of readerships (whom the text was written for and who the actual user is, etc.); links within newsgroups (is it more similar to conversation than the readversation or is it still different?); the tendency to modify sites; time measurements - the rush hours; etc.

According to the articles I have read, and according to what I myself experience as a user of the Internet, hypertext discourse is nothing like linear text. It is more dynamic, less easy to follow, and it is a world within a very flexible frame.

I tend to understand this electronic world in the context of our postmodernist society: full of citations, associations, allusions and analogies. There are many projects within the net trying to insert as much "classical" information as possible into it. Since my conclusion is that linear (printed) text is very different from this non-linear (hypertexted) text, the inserted on-line classical texts may become different from the originals, because of the new contexts they would be given by readers.

I hope you have gained a clearer understanding of what readversation is from reading this article. If you want to keep on reading, there are more articles discussing these points on-line; here are some:

Applying Discourse Theory to aid Hypertext Navigation - <http://www.cogsci.ed.ac.uk/hcroc/wgs/graphics/publications/echt-94.html>

Hypertext and the Politics of Interpretation –
<http://reven.ubalt.edu/staff/moulthrop/essays/essays.html>
Du texte à l'hypertexte: vers une épistémologie de la

discursivité hypertextuelle – <http://www.univ-paris8.fr/~hyperion/jean/articles/discursivite.html>
Hypertext Publishing and the Evolution of Knowledge –
<http://reality.sgi.com/employees/whitaker/Hypertext/HypertextPublishingKED.html>

REFERENCES

1. BEAUGRANDE R. de. 1985. "Text Linguistics in Discourse Studies" in *Handbook of Discourse Analysis* ed.: T. A. Van Dijk. Orlando, Florida: Academic Press. Vol. 1.
2. CARLSON P.A. 1989. "Hypertext and Intelligent Interfaces for Text Retrieval" in *The Society of Text*. ed.: E. Barrett. Massachusetts: MIT Press.
3. CHARNEY D. 1994. "The Effect of Hypertext on Processes of Reading and Writing" in *Literacy and Computers: The Complications of Teaching and Learning with Technology*. ed.: C. L. Selfe & S. Hilligoss . New York: The Modern Language Association of America.
4. DILLON A., MCKNIGHT C. & RICHARDSON J. 1993. "Space - the Final Chapter or Why Physical Representations are not Semantic Intentions" in *Hypertext: a psychological perspective*. ed.: Dillon A., McKnight C. & Richardson J. UK: Ellis Horwood Ltd.
5. EDWARDS D. M. & HARDMAN L. 1989. "Lost in Hyperspace: Cognitive Mapping and Navigation in a Hypertext Environment" in *Hypertext - theory into practice*. ed.: R. McAleese. Oxford: Intellect Limited.
6. GRAY S. H. 1995. "Linear coherence and relevance: Logic in computer-human 'conversations'" in *Journal of Pragmatics* Vol. 23.
7. JOHNSON-EILOLA J. 1994. "Overview: Reading and Writing in Hypertext: Vertigo and Euphoria" in *Literacy and Computers: The Complications of Teaching and Learning with Technology*. ed.: C. L. Selfe & S. Hilligoss . New York: The Modern Language Association of America.
8. LANDOW G. P. 1992. *Hypertext*. Baltimore: The Johns Hopkins University Press.
9. MEYROWITZ N. 1991. "Hypertext - Does It Reduce Cholesterol, Too?" in *From Memex to Hypertext: Vannevar Bush and the Mind's Machine*. ed.: Nyce James M. & Kahn Paul. San Diego, CA: Academic Press.
10. NYCE J. M. & KAHN P, ed. .1991. *From Memex to Hypertext: Vannevar Bush and the Mind's Machine*. San Diego, CA: Academic Press.
11. RADA R. 1992. *Hypertext: From Text to Expertext*. UK: McGraw-Hill Book Company Ltd.
12. SAMARAPUNGAVAN A. & BEISHUIZEN J. 1994. "Domain Expertise an Knowledge Acquisition From "Nonlinear" Expository Text" in *Computers in Human Behavior*, USA: Pergamon Press. Vol. 10, pp. 77-91
13. SCHIFFRIN.D. 1994. *Approaches to Discourse*. Oxford: Blackwell.
14. SEYER P. 1991. *Understanding Hypertext - Concepts and Applications*. Pennsylvania: Wndcrest Books.
15. SHNEIDERMAN B. 1989. "Reflections on Authoring, Editing, and Managing Hypertext" in *The Society of Text*, ed.: E. Barrett. Massachusetts: MIT Press.
16. WHALLEY P. 1993. "An Alternative Rhetoric for Hypertext" in *Hypertext: a psychological perspective*. ed.: Dillon A., McKnight C. & Richardson J. UK: Ellis Horwood Ltd.