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IN CONTRAST TO THE ACTION TAKEN BY COACHES,
THE AMERICAN MEDICAL ASSOCIATION STRONGLY CONDEMNS
THE LOSS OF BODY WATER FOR ATHLETES. THEY CONDEMN
LOSS OF BODY WATER DUE TO THE FACT THAT THE loss
of body water impairs cardiovascular functioning,
which limits work capacity. More specifically, a
loss of three percent of body water impairs physical
performance and a loss of five percent results in
heat exhaustion. Moreover, a loss of seven percent
of body water causes hallucinations. Losses of ten
percent or more of body water result in heat stroke,
deep coma, and convulsions; if not treated, death
will result.

Source:Meyer and Freedle(1984)

problem/Solution

A SERIOUS PROBLEM IS that athletic coaches fre-
quently require wrestlers, boxers, judo contestants,
karate contestants, and football team members to
lose body water so that they will attain specified
body weights. These specified weights are consider-
ably below the athletes' usual weights.

A SOLUTION TO THIS PROBLEM IS FOR SCHOOL
ADMINISTRATORS TO SUSPEND COACHES WHO REQUIRE
ATHLETES TO LOSE BODY WATER. THIS STEP MUST BE
TAKEN DUE TO THE FACT THAT THE loss of body water
impairs cardio-vascular functioning which limits
work capacity.More specifically, a loss of three
percent of body water impairs physical performance
and a loss of five percent results in heat exhaus-
tion. Moreover, a loss of seven percent of body water
causes hallucinations. Losses of ten percent or more
of body water result in heat stroke, deep coma, and
convulsions; if not treated, death will result.

Comparison

Athletic coaches frequently require wrestlers,
boxers, judo contestants, karate contestants, and
footbal team members to lose body water so that they
will attain specified body weights. These specified
weights are considerably below the athletes' usual
weights.

Causation

IT IS TRUE THAT athletic coaches frequently
require wrestlers, boxers, judo contestants, karate
contestants, and football team members to lose body
water so that they will attain specified body weights.
These specified weights are considerably below the
athletes' usual weights.

AS A RESULT, TRAGEDIES ARE UNWITTINGLY CAUSED
BY THE COACHES WHO REQUIRE THIS LOSS OF BODY WEICHT
IN THESE SITUATIONS. THESE TRACEDIES OCCUR DUE TO
THE FACT THAT THE loss of body water impairs cardio-
vascular functioning, which limits work capacity.
More specifically, a loss of three percent of body
water impairs physical performance and a loss of five
percent results in heat exhaustion. Moreover, a loss
of seven percent of body water causes hallucinations.
Losses of ten percent or more of body water result
in heat stroke,deep coma, and convulsions; if not
treated, death will result.

Appendix

Four Different Versions of The Text
"The Loss of Body Water"

Collection of Descriptions

SEVERAL ASPECTS OF THE LOSS OF BODY WATER
WILL BE DISCUSSED. FIRST,athletic coaches frequently
require wrestlers, boxers, judo contestants,karate
contestants, and football team members to lose body
water so that they will attain specified body weights.
These specified weights are considerably below the
athletes' usual weights.

SECOND, THE LOSS OF BODY WATER SUSTAINED BY
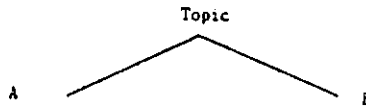A 150-POUND INDIVIDUAL EACH DAY IS THREE PINTS OF
WATER.

THIRD,loss of body water impairs cardio-
vascular functioning, which limits work capacity.
More specifically, a loss of three percent of body
water impairs physical performance and a loss of
five percent results in heat exhaustion. Moreover,
a loss of seven percent of body water causes halluci-
 nations. Losses of ten percent or more of body water
result in heat stroke, deep coma, and convulsions; if
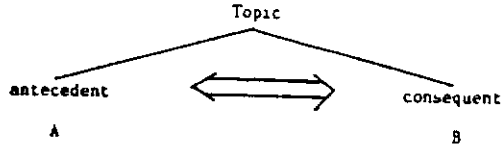not treated, death will result.

4- Conclusion

Comprehension failures can be, to some extent, attributed to the L_2 reader's lacking the appropriate relevant background knowledge required by the text. Furthermore , they are less sensitive to the top-level rhetorical organization of various text-types. They appear to depend mostly on intra-sentential, lexical and syntactic cues for comprehension, and are negligent of supra-sentential organizational structures of text-types. Hence, it can be claimed that through activating and bringing about sensitivity to the appropriate schemata and overall organizational patterns of texts, L_2 readers would be more capable of storing, retrieving and recalling the information embedded in the texts under focus. Therefore, through overt instruction of the top-level rhetorical for-mulae of various text-types and creating an awareness of different rhetorical patterns, EFL teachers will be able to tap on the readers' relevant schemata of text structures and pave the way for better comprehen-sion of what they read.
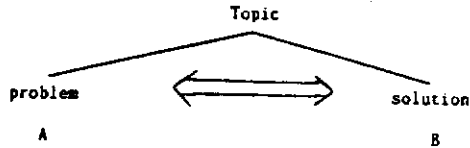
FIGURE 3

Relationships Between Nodes in Four Top-level Structures

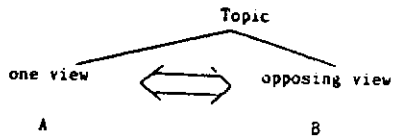==

Collection of Descriptions

```
                          Topic
                            /\
                          /    \
                        /        \
          A          /            \          B
```

No relationships among A and B; each is independent of the other

Causation

```
                          Topic
                          /\
                        /    \
                      /        \
      antecedent    <======>    consequent
          A                         B
```

Relationship between A and B is antecedent/consequent relationship;
consequent is result of antecedent.

Problem/Solution

```
                          Topic
                          /\
                        /    \
                      /        \
      problem       <======>    solution
          A                         B
```

Relationship between A and B is problem/solution relationship;solution
matches need established by problem.

Comparison

```
                          Topic
                          /\
                        /    \
      one view        <===>    opposing view
          A                         B
```

Relationship between A and B is comparative relationship:
overlapping issues viewed from different perspectives.

Source:Carrell (1984c).

memory about the text. Not all of the information in the hierarchically organized schema is equally important or accessible in encoding, storing, or retrieving. The superordinate, or top-level,stru- cture, which corresponds to the main ideas of a passage and the interrelationships among these main ideas, is cognitively more salient than the lower levels, which correspond to supporting ideas,detailed subordinate information(Carrell, 1984c:447).Hence, it can be claimed that the more highly organized structures such as causation,problem/solution, and comparison are more facilitative of encoding,storage and subsequent retrieval than the less tightly or- ganized ones such as collection of descriptions,due to the particular relationships holding between the top-level nodes of these discourse types(See Figure 3).

the relevant background knowledge of the text or-
ganization to L_2 readers, Celce-Murcia and McIntosh
(1979:191) hold that

> many texts drawing on the rhetorical
> tradition also instruct students in
> the use of schemes according to which
> materials can be organized and argu-
> ments presented. Emphasis is given
> to different patterns of organization
> that paragraphs might assume through
> processes of analysis, contrast,
> analogy, etc.

According to schema theory, reading comprehen-
sion is a process which requires the reader to be
aware of the organizational pattern being used for
the arrangement of the material to convey the ideas
clearly. For the comprehension of a specific text ,
the reader selects and activates the formal schema
which is relevant and best fits the text under
focus.

The schema employed to comprehend a text
acts like an outline which guides the reader in
organizing the text during the process of encoding
(into memory).Likewise, during recall, the skilled
reader activates this same kind of superordinate
schema which had been used to encode the intention
and uses it to retrieve the information stored in

activate the required and relevant schemata through
which they try to interpret the text consistently.
The more successful they are in activating the
appropriate schemata, the higher their level of
comprehension is thought to be. Laying stress on
the relevance of schema theory to foreign language
reading, Carrell (1984 a: 341) states that

> schema theory suggests that building
> and learning to activate appropriate
> background knowledge of text content
> and text rhetorical organization ought
> to produce better reading comprehension.

In order to guarantee a high level of com-
prehension in reading , EFL reading teachers are
expected to aim at activating the relevant back-
ground knowledge required for the interpretation
of a specific reading text. EFL teachers can dis-
cover the non-existent schemata and before starting
the reading task, attempt to construct them in the
student reader's mind. To some extent, this objective
can be achieved through resorting to the strategy
of providing the readers with the appropriate back-
ground knowledge with respect to the rhetorical
organizations and underlying structures of various
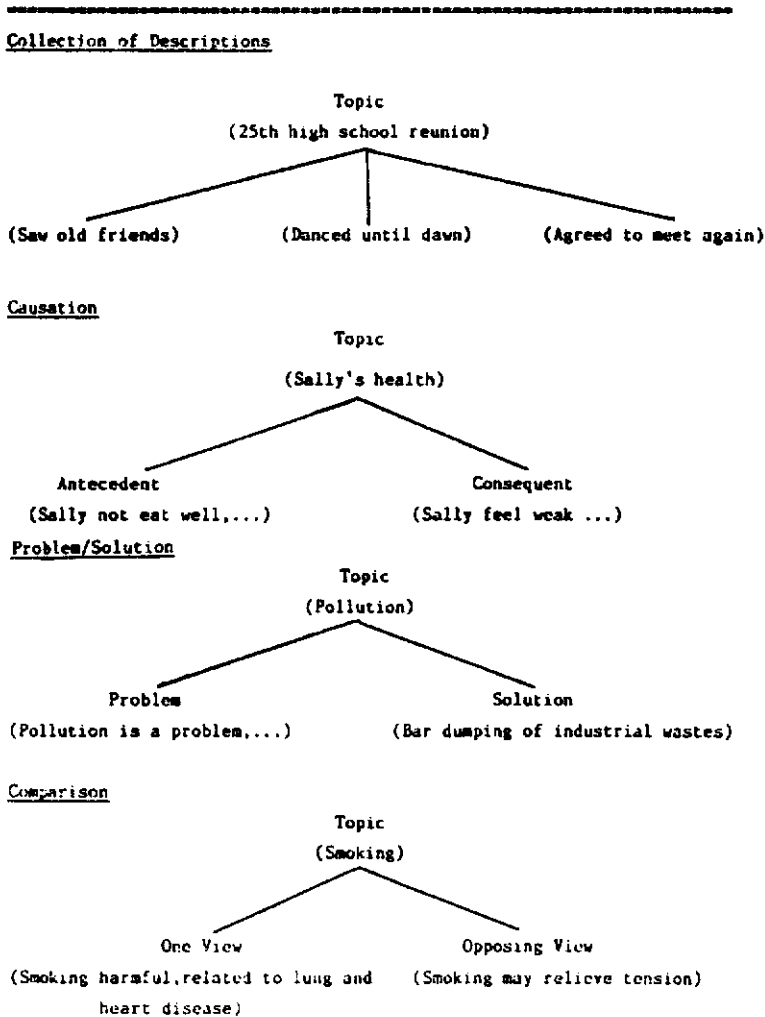text types. Concerning the necessity of imparting

3-Schema Theory

As mentioned before, reading comprehension
is an interactive process between the text and acti-
vation of the reader's relevant background knowledge
called schema which has to do both with the formal
rhetorical organization and the content of a text.
Anderson(1980:129) defines a schema as large,complex
units of knowledge that organize much of what we
know about general categories of objects
and classes of events. In the studies and researches
conducted currently, schema theory, proposed by
Barlett in 1932, cogently favours the strategy of
equipping the readers with the operative foreknow-
ledge of the organizational patterns of various
types of texts. According to Anderson, et al.(1977:
367), three functions played by the schemata are as
the following: First, schemata provide the basis for
"filling the informational gaps"in a text. Second,
schemata constrain a reader's interpretation of an
ambiguous message. Third, it is by establishing a
correspondence between things known, as represented
by schemata, and the givens in a message that readers
monitor their comprehension and know whether they
have understood the text.

In the process of reading, the readers

FIGURE 2

Top-Level Structure of Illustrative Mini-Texts

▄▄

<u>Collection of Descriptions</u>

Topic

(25th high school reunion)

(Saw old friends)   (Danced until dawn)   (Agreed to meet again)

<u>Causation</u>

Topic

(Sally's health)

Antecedent   Consequent
(Sally not eat well,...)   (Sally feel weak ...)

<u>Problem/Solution</u>

Topic

(Pollution)

Problem   Solution
(Pollution is a problem,....)   (Bar dumping of industrial wastes)

<u>Comparison</u>

Topic

(Smoking)

One View   Opposing View
(Smoking harmful,related to lung and   (Smoking may relieve tension)
heart disease)

Source: Carrell (1984c)

Comparison

Despite evidence that smoking is harmful,many people claim this isnot so.Although smoking has been related to lung and heart disease, for some people smoking may relieve tension.

The top-level structures of these four mini-texts are diagrammed in Figure 2.

least tightly structured text types, and causation,
problem/solution and comparison are among the highly
organized ones. The majority of the expository texts
contain readily identifiable organizational plans
and rhetorical patterns, which make it easy to ascribe
them to one of the previously-mentioned discourse
types. In order to depict the text-specific charac-
teristics of these discourse types more clearly ,
Carrell (1984c :444) has used the following mini-
texts:

Collection of Descriptions

> Our 25th high school reunion was held
> last year. We saw many old friends, danced
> until dawn, and agreed to meet again in five
> years.

Causation

Sally wasn't eating well,exercising, or
resting enough. As a result, she felt weak and
run-down and never wanted to do anything.

Problem/Solution

Pollution is a problem;polluted rivers are
health hazards and eyesores. One solution is to bar
the industrial wastes.

tion type is a specific kind of grouping by associ-
ation in which one element of association is
subordinate to another, namely the topic. By present-
ing a particular attribute, specification or setting,
the description gives more information about the
topic. When a number or collection of attributes ,
specifications or settings are given about a topic,
the structures of collection and description are
combined to form a sixth type-collection of descrip-
tions. The causation type represents ideas which are
grouped not only chronologically, but which are also
causally related. This discourse type is like the
if-then statements of logic, or like cause-effect
(antecedent-consequence) statements.The problem/solu-
tion type contains all the features of cause-effect,
with the additional feature of overlapping content
between propositions in the problem and solution.The
comparison type is on a different scale from causa-
tion and problem/solution.Rather than being organized
on the basis of time or causality, it is organized
on the basis of opposing viewpoints(Carrell, 1984_c:
442).

      If the relevant components of each discourse
type are delved into and analyzed carefully, it be-
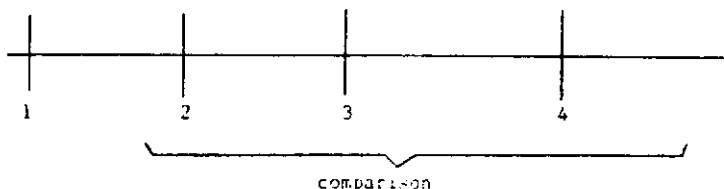comes clear that collection and description are the

FIGURE 1

Components of Each Discourse Type

==

grouped by   grouped by   causally or   at least one aspect

association   sequence   quasi-causally   of the solution matches in

              (e.g.,time)   related   content and stops an

                                            antecedent of the problem

        1   2   3   4

      collection   causation   problem/solution
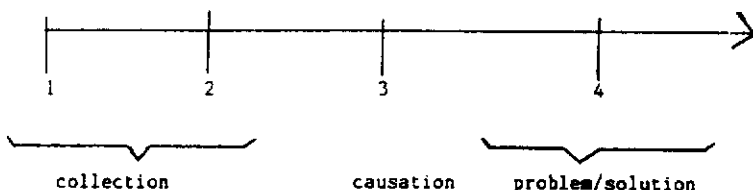
Description
a specific type of
grouping by association:
one element of the
association is
subordinate to another

grouped by   at least   number of matching relationship structures

association   one   and issues covered

        1   2   3   4

                     comparison

Source:Meyer and Freedle(1954).

moving off the track. Hence, one of the effective
strategies for the enhancement of L_2 readers' com-
prehension is to use the technique of providing them
with the operative foreknowledge of the underlying
structures of various texts, and giving directionality
to their conceptions, interpretations and expectations
developed with respect to the texts under focus.

According to Meyer (1979), there exist five
basic ways for organizing various types of expository
texts,and it has been supported empirically that the
specified discourse types influence the reading process
and the resulting comprehension drastically. These
five types of expository organization consist in
collection, description, causation, problem/solution,
and comparison. The crucial and distinctive charac-
teristics of each discourse-type pertaining to the
foregoing classification are clearly presented in
Figure 1.

Among these different types of expository
discourse, the collection type represents the loosest
organizational types, being merely a grouping or
listing of concepts or ideas by association. If the
association is by sequence(by time, for example),
then the listing becomes more organized(yielding,
for example, a historical chronology). The descrip-

evidence that we should be considering
rhetorical factors in the text as well
as more traditional intrasentential
linguistic factors.

2-Effects of Structural Qualities

Successful understanding of a text requires
a coherent representation of the text in memory. On
the one hand, this representation includes the in-
dividual pieces of information presented in the
text. On the other hand, it contains information
about the interrelationships between these individual
pieces of information; that is, about the structure
of the text. As their experience with the target
language increases, L_2 readers become more adept at
recognizing the structural properties of the texts
they encounter (Horiba et al.,1993:346).

If the readers gain sufficient knowledge
with respect to the rhetorical organization of
various types of texts, they will be in a better
position to think along with the writer and decipher
the main points of the text. In other words,
familiarity with the organizational or structural
patterns will act as an aid for the efficent com-
prehension and retention of the required information
and will pave the way for the readers to follow the
writer's line of argument through the text and avoid

information at lower levels, both immediately after
reading and listening, and also over time (Meyer,
 1977: 307).

        University students studying English for
academic purposes would be called on to: read for
information and to remember it-for example, in pre-
paring for exams and class assignments. The efficiency
with which students can read under such circumstances
is important. If they can get the necessary infor-
mation quickly and effectively, they will probably
perform well and feel better about the task. By
teaching them a little about the ways in which ex-
pository texts are typically organized at the top
level, they will learn how to use their knowledge
to improve their comprehension of what they read,
as well as to improve their recall of what they
read (Carrell, 1985:735). Urquhart(1984:180)expresses
his acquiescence concerning the necessity of the
prior knowledge of the text structure to the effect
that

> textual factors must be particularly
> important when reading in a foreign
> language. Although there has been a
> tendency to think that the main
> problems foreign language readers
> face are lexical and syntactic, the
> point is that there is accumulating

87).

   Discourse analysts and language teaching
specialists unanimously maintain that various types
of texts have specific schematic structures and read-
ers are believed to have sensitivity to these
structures and make use of them in order to com-
prehend the text and recall the content. The degree
to which the structure and organization of the
material is compatible with the individual's cognitive
network is one of the significant factors which seems
to affect retention and recall of information
(Chastain, 1988:42). While admitting the crucial
role played by the text-specific prior knowledge,
Jonz (1989: 209)holds that

> in addition to the sequence of
> sentences, the various structural
> features of text, from the phonology
> and orthography at one pole to top-
> level rhetorical patterning at the
> other, operate interactively to con-
> strain comprehension and interpretation.

   Thus, the way the information in a passage
is organized is an important factor in reading com-
prehension. Specifically, the information located
high, or at top levels, in the hierarchical
organization of a passage is recalled better than

Hence, there exists a close relationship between
reading comprehension and metacognitive awareness
of reading strategies. One of the significant com-
ponents of metacognitive awareness or suprasentential
judgement is that of text structure. Therefore,read-
ing and comprehending foreign language materials
can be, to some extent, improved provided that lan-
guage teachers pave the way for the realization of
this objective and equip the readers with the basic
knowledge of the rhetorical organization of the ex-
pository texts and contribute to the learners' under-
standing accordingly. The achievement of this purpose
can be partly realized through providing the readers
with the knowledge of the rhetorical organization of
the text and reading strategies required to compre-
hend it.

Research on discourse or text comprehension
has shown that comprehension is determined not only
by the sentence patterns and paragraph development,
but also by the overall suprasentential or rhetorical
organization of the text. Each type of text-i.e.
narrative, descriptive, expositroy or scientific
texts-has its own conventional structure; knowledge
of these conventions aids readers in comprehending
the text as well as recalling it later(Carrell,1984b:

due to the fact that reading comprehension, accord-
ing to schema theory, is a process taking place
through an interaction between the reader and the
text. Among other things, this means that reading
comprehension is an interaction between the reader's
background knowledge of the concepts involved and
processing strategies used for deriving the meaning
on the one hand, and the rhetorical organization of
the text, on the other (Carrell, 1984c:441).Further-
more, Jonz (1987:410) has laid great stress on the
existence of relationship between the reader and the
text while stating that

> to study the relationship between
> person and text, we focus attention
> on the knowledge, both linguistic
> and colinguistic, that language users
> bring to the task of comprehending,
> varying the language user's access
> to certain linguistic features of
> text and measuring comprehension as
> directly as possible. The simple
> principle is that features of text
> exert a strong influence on the
> meaning that language users, especially
> non-native language users, derive
> from interacting with the text.

Reading involves activation of relevant know-
ledge and related language skills to accomplish an
exchange of information from on person to another.

F.Farrokhi (M.A.)*

Facilitating EFL Reading by Teaching
Rhetorical Organization of Texts

1-Introduction

Foreign language learners encounter serious
difficulties in reading and comprehending texts in
a foreign language when reading them for the first
time. Nevertheless , it is an established fact
among language professionals that reading in a
foreign language and obtaining the required infor-
mation embedded in the text is one of the prime
purposes sought in a foreign language curriculum.
But this objective becomes hard to achieve, mainly

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