

A. R. Luria

---

A Note on the Organization  
of the Fluent Speech in  
Semantic Form of Amnesic Aphasia

---

1974

A Note on the Organisation of Fluent Speech  
in Semantic kind of Amnesic Aphasia

by A.R.Luria (Moscow)

---

During the last decades two basic kinds of aphasia were described - those of fluent and non-fluent types. (Luria, 1973).

In fluent aphasia complex (logical or paradigmatic) organisation of language was disturbed whereas fluent, syntagmatic speech was preserved. In non-fluent aphasia the acquisition of logical relations of language remained undisturbed whereas syntagmatical connections, underlying fluent speech suffered.

It has to be mentioned that in all kinds of fluent aphasias (acoustic or temporal, semantic or parieto-occipital) fluent speech was preserved only to a certain limit. Amnesic disturbances in word finding or naming limited the process of fluent speech, and expressed attempts to find proper words (...I went to a walk, and there was... a hen?...no...not a hen... a duck...no, not a duck... a bird... no... it does fly...but not a bird... well... ah! a butterfly!...) results very often in a disrupted speech which remains potentially fluent but which becomes interrupted as a result of the troubles of

immediate finding of a needed word.

How can this group of patients overcome such a defect?

We shall illustrate this way by one example which is of certain interest because we are dealing here with an observation of a widely known patient and because the data are based on observations made during more than 30 years.

Some three years ago we published a small book "The man with a shattered world" (Basic Books, 1971) where we described a patient (Zassetski) who during World War II received a fragment shell injury in the left parieto occipital lobe. A severe syndrome of parietal aphasia resulted, which started with defect of orientation in space, agraphia expressed amnesic aphasia (troubles in word finding) and severe disturbances of decoding complicated logical-grammatical constructions.

The last group of defects (naming and semantic) remained throughout the 30 years of careful study and rehabilitative treatment, whereas fluent speech with well organized prosodies proved to be preserved.

During the first year our patient was fully alectic and agraphic; but after the first 4 months we were able to recover his writing. The method we used was a peculiar one. The patient was unable to write letters consciously preserving their orientation in space; he could not single out separate letters and grasp the sequence of letters in the

word scheme. All attempts to use an ordinary training routine (with analysing a word in syllables, combination of syllables in a word) did not result in any success.

Knowing that the central factor underlying the syndrome was a defect of grasping simultaneous relations and observing the fact that motor automatisms were preserved we proposed to the patient that he write as fast as possible not removing the pen from the paper; in other words we asked the patient to stop all attempts of conscious analysis of the word and to apply the motor automatisms of his well accustomed writing. The paradoxical fact was that while using his motor automatisms he could at one write a short word, being very surprised that writing was really preserved, and after this first attempt at the writing process was so recovered that he started to write his diary and during the next 25 years accomplished an outstanding document, describing his former life and the history of his wound in more than 3,000 (now 4,500) written pages. This document was the basis for my book "The man with a shattered world" where an extended description of the whole syndrome was made.

The process of writing the diary was not at all an easy task for this patient: it took an incredible amount of time to write it. The patient spent 5-8 hours each day to write one to three pages. The difficulties were not

associated with the writing of the word itself, rather with finding the proper word, with a consciously ~~wide~~ combination of words in a phrase, with finding the scheme of the phrase needed etc. Reading the just written phrase remained terribly difficult and de-coding of separated word remained a step-by-step process. Fluent written speech was hampered by amnesic aphasia and defects in logical grammatical construction.

Here is how the patient himself describes his difficulties:

"...I am sitting at my work, my pencil in my hand and a sheet of paper.. All words are bewitched, I am unable to find them to express my thoughts... I have to make terrible efforts to find firstly one word, and then the second, and the third... Different words come to my mind, but I cannot find the right one... And when it appears in my memory - the thought is lost, and I have to start anew... So I have sometimes to wait hours and hours till the thought appears, and then I have the same troubles, trying to find word by word, to preserve my thoughts and to write them down... It is a titanic work..."

The full awareness of his basic problem caused the patient to want to overcome these difficulties.

The answer was found (more practically than logically only after ca 25-26 years of his daily writing. It consisted in the following method: being unable to master the extended written exposition which was accomplished step-by-step, he turned to another way and began to use a kind of rhythmical prose which was close to poetry: here he used a well automatized speech process, using as fully as possible the preserved syntagmatical units and evading so far as it was possible a conscious, step-by-step analysis of nominal and logico-grammatical organization of language.

That is why his diary, which had been during the first decades an ordinary extended composition made by a long series of conscious verbal trials, underwent a basic changes, becoming more and more a process of rhythmical ("poetic") speech, where the patient added excessive words which were not needed for the contents of his narration but which were used to make his narration as automatized as possible with a dominance of prosodic organization of his fluent speech. This method - as the patient's experience told him, was much easier than an ordinary method, and that most of his diary written during his last years became a kind of "poetical" rhythmized" prose, which made the patient able to stop dealing with paradigmatic relations which were difficult to come by and to turn to automatized syntagmatic speech organization as much as it

was possible. We shall try to give only a few examples trying to preserve the Russian constructions of the text in its English translation.

"Here am I sitting, my friends, and writing, oh, how I survived and, oh, my friends, I am trying to find all the words to express my terrible illness. ... Words, oh my friends, they are coming so slow to my paper, and I doubt if you will understand, oh, my friends all the years of my terrible illness. After this terrible wound, oh my friends, all was broken to pieces... Now I am a child who lost all his powers of acquired learning. All the knowledge I had disappeared, oh yes, oh my friends"...etc.

Hundred of *pages* of Z.'s diary are now written in such a style, "...How another physician I have, oh my friends, she is young and oh, yes she is bright and so nice in appearance..." "How I shall be your doctor she said, don't you mention?" "Oh, no! was my answer, I do not object" I have said, oh my friends" etc.

The data we mentioned are of significance both for a better understanding of the ways which can be used for an overcoming a basic defect in cases of a semantic kind of amnesic aphasia (where paradigmatic defects result in some secondary troubles of the primary preserved syntagmatic speech), and for a better understanding of the basic psychological differences of the organization of poetical

is prosaic speech processes.

We have the liberty in presenting this short note because it is based on long observations of a unique case of a subject who already contributed a significant amount to our knowledge of semantic aphasia and whose experience during the 30 years of his illness gives a unique possibility to study some important neuropsychological mechanisms.

---