Clinical Aspects of the Schizoaffective Disorder in Comparison with Schizophrenia After a 15-year Evolution

Bredicean Cristina[1,3], Ienciu Monica[1,2], Papava I.[1,3], Salva Emanuela[2], Mihalcea Roxana[2], Popa Ica[3], Ile L.[2,3]

[1] Department of Psychiatry, Faculty of Medicine, Victor Babes University of Medicine and Pharmacy Timisoara
[2] Psychiatric Clinic Eduard Pamfil, Timisoara
[3] Mara Institute, Timisoara

Background: Schizoaffective disorder is currently one of the debated nosological categories, nowadays existing more controversial suppositions regarding its ranging.
Aim: The assumption of this study was that schizoaffective disorder is a version of schizophrenic disorder.
Methods: In pursuit of this supposition, two groups of subjects were selected, called group A, which includes subjects diagnosed with current schizoaffective disorder – according to ICD 10 – and group B, who were diagnosed with current schizophrenia. The two groups were relatively analyzed aiming at socio-demographic and clinical parameters at first admission and clinical evolution and global functioning 15 years past the first episode.
Results: The results showed that there are differences on diagnosis at first hospitalization in subjects who subsequently developed schizoaffective disorder, which could have been produced by an episode of schizophrenia, an episode of acute and transient psychosis or an affective episode. Also, the long-term outcome of the subjects showed differences between the two groups regarding the number of hospitalizations – which is much higher in subjects from schizoaffective group than in those with schizophrenia. The schizoaffective disorder group shows superior professional and family functioning in comparison with the group diagnosed with schizophrenia.
Conclusions: The conclusion of this study is that schizoaffective disorder is a nosological entity different from schizophrenia. In order to clarify its nosological status, neurophysiologic, laboratory examinations and family studies are needed.

Keywords: schizoaffective disorder, schizophrenia, ICD 10, long-term outcome, global functioning

Introduction

Schizoaffective disorder is currently one of the controversial nosological categories. The term "schizoaffective" was introduced by Kasanin [1] who described 9 patients who clinically experienced psychotic and affective symptoms, who have completely recovered after several months and had a good premorbida movement.

The term, as a separate category, was introduced in modern diagnosis systems starting with DSM III and ICD 10. ICD 10 introduced the term "schizoaffective disorder" but it only defines the notion of schizoaffective episode and not that of disorder – meaning the aspects related to the long-term outcome. Schizoaffective disorder is inserted within the group of "schizophrenia, schizotypical and delusional disorders".

The aim of this work was born from the question: is schizoaffective disorder a variant of schizophrenia or is it a separate nosological entity?

Hypothesis:

1. Socio-demographic and clinical parameters at first admission differ from the subjects with schizoaffective disorder to those with schizophrenia.
2. Clinical evolution and global functioning after 15 years from the first episode are higher in subjects with schizoaffective disorder in comparison with those with schizophrenia.

Material and methods

The present research is part of a larger study carried on in the Timisoara Psychiatric Clinic focused on the typology and evolution of endogenous psychosis. At the core of the research there is the Endogenous Psychosis Case Register, which was started in 1985. Between 1985–2004, 1621 cases have been recorded.

Two groups of subjects were selected from this Case Register around inclusion and exclusion criteria - without the use of statistical methodology - known as group A (which includes subjects diagnosed with current schizoaffective disorder) and group B (subjects who were diagnosed with schizophrenia). Each study group includes 20 subjects.

Inclusion criteria:

1. First episode of psychosis was between 1985–1994 and required hospitalization in Timisoara Psychiatric Clinic ADE;
2. Current diagnosis is schizophrenia, according to ICD 10(F.20) and schizoaffective disorder (F. 25);
3. Hospitalization in the Clinical Ambulatory Timisoara;
4. Subjects agreed to participate in the study.

Table I. Gender characteristics of groups

	Male	Female
Schizophrenia	6	14
Schizoaffective disorder	4	16

Exclusion criteria:

1. Presence of personality disorders or mental retard;
2. Presence of a disease caused by drug use or an organic disorder.

Since schizoaffective disorder does not have a very clear definition from long-term outcome perspective, it is very important to define the clinical characteristics of the subjects introduced in the study group.

Clinical features were:

- First episode of psychosis was classified as schizophrenia, acute and transient psychotic disorder or affective depressive or manic episode with psychotic symptoms;
- After the first five years of evolution, the subjects presented only schizoaffective episodes;
- The current diagnostic is schizoaffective disorder, according to ICD 10.

The two groups were analyzed retrospectively on the basis of existing case files, but during 2009 a sectional assessment was also conducted. Cross evaluation was performed during the remission period of clinical symptoms, analyzing several parameters out of which only those who belong to the global functioning of each topic were selected.

The following parameters were analyzed:

1. Socio-demographic characteristics of each subject.
2. Diagnosis of the first episode of psychosis.
3. The average duration of evolution.
4. Number of hospitalizations until present time.
5. Family and professional functioning, onset and present

To assess these parameters existing history data were used, supplemented by a clinical interview currently conducted . Due to low number of subjects, no statistical processing of data was carried out, but a simple results analysis.

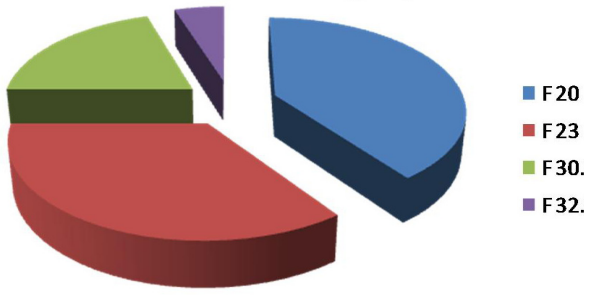

Fig. 1. Diagnostic of first episode psychosis of schizoaffective group

Table II. Familial and profesional characteristic of the groups first hospitalization/present

Familial/professional	Schizophrenia First hospitalization	Schizophrenia present	Schizoaffective disorders first hospitalization	Schizoaffective disorder present
Married	6	7	3	8
Single	14	13	17	12
Employed	10	1	9	3
Unemployed	10	19	11	17

Results

Socio-demographic characteristics of the two groups were:

1. Distribution by sex (Table I).

The proportion of female subjects in the group with schizoaffective disorder (80%) was higher than in the group with schizophrenia (70%) but with low difference between groups.

2. Distribution of the average residence

All subjects in both groups came from urban environment.

3. Average age of onset

Schizoaffective disorder shows an average age of onset of 24.8 lower than that of subjects with schizophrenia which is of 25.2, an almost insignificant difference.

Regarding the diagnosis of the first episode of psychosis there are significant differences between the two groups. Subjects with schizoaffective disorder show a different diagnostic at the first episode compared to subjects with schizophrenia which show the same diagnostic as at present, namely schizophrenia (Figure 1).

The average duration of development was relatively similar – 20.7 years for subjects in the group diagnosed with schizoaffective disorder group and 21.3 years for subjects with schizophrenia.

The group analysis in 2009 of the clinical process of subjects (number of hospitalization days during this period) shows a twice higher rate of hospitalization days for subjects with schizoaffective disorders compared to those with schizophrenia (Figure 2).

Family and social functioning of subjects evaluated at the first episode of psychosis were analyzed compared to the present (Table II). These results indicate that subjects with

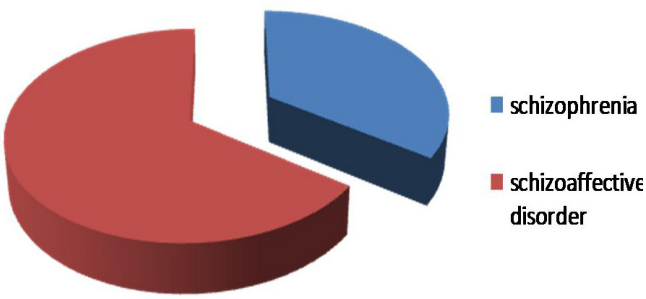

Fig. 2. Rate of hospitalization

schizoaffective disorder differ from those with schizophrenia because they obviously have a more favorable outcome.

Discussion

Internationally, at present, regarding schizoaffective disorder, four nosological concepts are being described:

1. Schizoaffective disorder is a variant of schizophrenia.
2. Schizoaffective disorder is a variant of affective disorders.
3. Schizoaffective disorder is an intermediate entity between schizophrenia and affective disorders.
4. There is a continuum of functional psychoses with schizophrenia at one end and affective psychoses at the other end of the spectrum [2].

Undertaken studies that tried to attest these nosological concepts obtained different outcome because they used different definition for schizoaffective psychoses, incomparable with each other.

In this study we tried to evaluate the nosological model: schizoaffective disorder is a variant of schizophrenia, with respect to the clinical diagnosis of first hospitalization as well as the outcome 15 years after first hospitalization.

Subjects introduced in the study showed a period of evolution of at least 15 years, are currently diagnosed with schizoaffective disorder (according to ICD 10) and became schizoaffective within five years after the first episode of psychosis.

The most obvious differences are related to the first episode of psychosis, in the sense that to the subjects who subsequently develop schizoaffective disorder, this can be represented by an episode of schizophrenia, acute and transient psychosis or an affective episode. Long-term outcome of subjects also showed differences between the two groups on the number of hospital admissions, which is higher in the subjects belonging to schizoaffective group than in those with schizophrenia. These results are not surprising, because this emotional component in the clinical layout cause an increase in the number of hospitalizations. Global functioning – socially, professionally and inside the family - is higher in the group with schizoaffective disorder compared with those with schizophrenia, these findings do not support to the model that schizoaffective disorder is a variant of schizophrenia.

As we have seen, the results show that there are differences between schizoaffective disorder and schizophrenia both clinically as well as in long-term outcome. To establish the validity of schizoaffective disorder as a separate diagnosis category, neurophysiologic, laboratory and family studies are required and it is also important to define the clinical archetype of schizoaffective disorder analyzed in the study.

Conclusion

The results of this study revealed the following:

1. The clinical picture at the time of first admission schizoaffective disorder are distinguishable from schizophrenia.
2. Average age of onset is the same for both groups analyzed and situated between 24 and 26 years.
3. Long-term results are different in the subjects with schizoaffective disorder, for these have twice the number of admissions compared to those with schizophrenia.
4. Professional and family functioning is higher in subjects with schizoaffective disorder compared to those with schizophrenia.

Schizoaffective disorder is a different nosological entity from schizophrenia. To clarify the nosological status, neurophysiologic, laboratory examinations and family studies are required, but also a clear differentiation between terms “schizoaffective disorder” and “schizoaffective episode”.

References

1. Kasanin J – The schizoaffective psychoses. Am J Psychiatry 1933; 13:97-126
2. Jager M, Bottlender R, Strauss A, Moller H-J – Fifteen-year follow-up of ICD-10 schizoaffective disorders compared with schizophrenia and affective disoders. Acta Psychiatr Scand 2004;109:30-37

Instructions for authors

All submitted manuscripts must be written in English.

Each author must complete and sign a Cover Letter. This must contain the title of article, the name(s) of all author(s). In the Cover Letter each author is required to attest that:
1) The manuscript is not submitted for publication elsewhere; in this case the cover letter must include the topic: "this paper has not been published previously" or "the results presented in this paper have not been published previously in whole or in part, except in abstract form";
2) The manuscript is an original work without fabrication, fraud, or plagiarism;
3) The author has read the complete manuscript and takes responsibility for the content of the manuscript;
4) Authors of research articles are required at the time of submission to disclose any potential conflict of interest (employment, consultancies, stock ownership, equity interests, and patent-licensing arrangements);
5) In the cover letter must be included a description of each author's contribution. Authorship credit should be based on 1) substantial contributions to conception and design, acquisition of data, or analysis and interpretation of data; 2) drafting the article or revising it critically for important intellectual content; and 3) final approval of the version to be published. Authors should meet conditions 1, 2, and 3. (See Uniform Requirements for Manuscripts Submitted to Biomedical Journals: Ethical Considerations in the Conduct and Reporting of Research: Authorship and Contributor ship, on http://www.icmje.org/ethical_1author.html)
6) All the authors are members of the University of Medicine and Pharmacy of Târgu Mureş and must have an institutional subscription. For non members, authors will be charged for publication (see extra charges).

In the cover letter please include a word count. Word count should comprise all parts of the manuscript (abstract, manuscript text, references, figure legends, etc).

MANUSCRIPTS THAT DO NOT CONFORM TO THE FORMAT GUIDELINES WILL BE RETURNED TO THE AUTHORS FOR REFORMATTING. MANUSCRIPTS SHOULD RESPECT ALL THE REQUIREMENTS OUTLINED BELOW.

MANUSCRIPT SUBMISSION
The manuscript must be submitted on a CD together with 3 typescript copies.

Disk / Electronic. Acceptable formats are Word 2003 or below. Please indicate on the label attached to your disk your name, your article title and the name of the word processing package used.
Typescript copies. The manuscript is typewritten on one side only of A4 paper, double spaced using 2 cm wide margins all around; all pages should be numbered consecutively. Text should only appear on one side of the page. Type manuscripts double-spaced in 12 point font, including references, figure legends, and tables, on one side of the page only.
As a guide for manuscript length, there should be no more than 1 figure or 1 table for every 500 words.

COPYRIGHT
If any tables, illustrations or photomicrographs have been published elsewhere, written consent for re-publication must be obtained by the author from the copyright holder and the author(s) of the original article.
The signed permissions must be submitted with the manuscript and be identified as to the relevant item in the manuscript (e.g., "permissions for Figure 1").

ABBREVIATIONS
Except for units of measurement, abbreviations are strongly discouraged. DO NOT USE ABBREVIATIONS UNLESS ABSOLUTELY NECESSARY. In order to abbreviate – the first time an abbreviation appears, it should be preceded by the words for which it stands.

MANUSCRIPT STYLE
Assemble manuscripts in the order listed: (1) title page (with author information page), (2) abstract and keywords, (3) introduction, (4) methods, (5) results, (6) discussion, (7) acknowledgements, (8) references, (9) appendices, (10) tables titles, (11) text tables, (12) figure legends, (13) figures, (14) acknowledgments and funding page (format may be altered for review articles and case reports, if necessary).

TITLE PAGE
The title page should contain:
A. the title of the article;
B. author(s): full name of all authors, department and institution in which the authors work, city, state or country, and zip code, name and address for correspondence, a contact telephone and an e-mail address. Give the institutional affiliation for each author by superscript numbers matched to the appropriate institution.
Use titles that stimulate interest, are easy to read and concise and contain enough information to convey the essence of the article. Title must NOT contain abbreviations.
Note that the title page must be printed separately.

ABSTRACT
Include no more than 250 words with the following headings: Objective, Methods, Results, and Conclusions. References should not be cited in the Abstract. Do not use acronyms or abbreviations. Abstract should be written as a single paragraph on a separate page following the title page.
Keywords: not more than 5, characterizing the scope of the paper, the principal materials, and main subject of work. Please use academically accepted keywords.

MANUSCRIPT TEXT
Original articles must include five main headings: Introduction, Methods, Results, Discussion, and Conclusion.
The presentation must be clear, concise and logically organized.

Introduction: Use very short introductions for presenting the context of the research for readers. Always end the introduction section with a clear statement of the study's objectives or hypotheses.
Methods: This section must describe the design of the study (selection/recruitment of patients, the number of patients), the study procedures including any interventions, measurements and data collection techniques and also the methods used for the statistical analysis.
For all manuscripts reporting data from studies involving human participants or animals, formal review and approval by an appropriate institutional review board or ethics committee is required and should be described in the Methods section. For those investigators who do not have formal ethics review committees, the principles outlined in the Declaration of Helsinki should be followed. For investigations of humans, state in the Methods section the manner in which informed consent was obtained from the study participants (i.e., oral or written). Editors may request that authors provide documentation of the formal review and recommendation from the institutional review board or ethics committee responsible for oversight of the study.

Results: In this section, the main characteristics of participants and your major findings must be presented.

Tables
Tables and figures should not be imbedded in the text of the article.
Each table should have a brief descriptive title and the approximate position of each table should be indicated in the manuscript.
Tables must not duplicate material in text or figures. Cite each table in text in numerical order.
Tables should be numbered consecutively with italic numerals and must be cited exactly as "(Table I, Table II, etc)".
All explanatory information and abbreviations should be given in a footnote below the table.
Each table should be typed single-spaced on a separate page after the Reference section in the submitted manuscript.