Methods and approaches in producing Bioethics knowledge, years 2001-2008, Bioethics Magazine published by the Federal Council of Medicine-CFM, in Brazil

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Resumo Foram examinados os 149 artigos publicados na *Revista Bioética*, do Conselho Federal de Medicina (CFM), no período de 2001 a 2008. Três variáveis foram analisadas em cada artigo: método científico, enfoque principal e palavras-chave (considerando-se a palavra mais aderente ao enfoque e, também, presente no enunciado do título). Os resultados demonstraram que 127 artigos (85,2%) foram produzidos pelo método teórico-conceitual e 22 (14,8%) por método experimental. Dentre esses últimos, 8 (36,4%) eram empíricos quantitativos e 14 (63,6%) qualitativos. O enfoque interdisciplinar foi o mais frequente (25,5%), seguido por enfoque em Medicina (24,8%). Duplo enfoque, Medicina e Filosofia (14,8%) e Medicina e Direito (10,1%) superaram enfoques isolados em Filosofia (3,3%) e em Direito (2,0%). As palavras-chave foram distribuídas em dez grupos temáticos, sendo *Ética/Bioética* (18,1%), *CEP/Ética em Pesquisa* (14,1%) e *Questões sociais* (14,1%) os grupos mais frequentes. Quanto ao tipo de método, os resultados são comparáveis aos observados em pesquisas internacionais. Enfoque e palavras-chave revelam considerável atenção a questões bioéticas no Brasil. Conclui-se que a construção de saberes divulgados pela *Revista Bioética* do CFM privilegia a interdisciplinaridade e se mantém atenta a questões bioéticas nacionais.

Palavras-chave: Publicações seriadas. Bioética. Brasil.



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Knowledge production in bioethics reveal great diversity of methods and approaches. Several areas inputted its publications in two ways: a) preserving methods and approaches (content) of specific discipline, added by pertinent ethics reflections: b) fostering the build-up interdisciplinarity. In the first case, researchers in bioethics start from the specialized academic formation (Philosophy, Medicine, Law, etc.) and they produce knowledge with ethical approaches, using traditional approaches, methods, and techniques in each expertise. Others, search to deconstruct barriers that compartmentalize disciplines and produce knowledge defined as interdisciplinary<sup>1,2</sup>.

Bioethics, in Brazil, started in the 1980s<sup>3</sup>, which becomes opportune to evaluate, in our country, distribution of the several methods and approaches production. Considering that *Bioética Magazine*, published by the Federal Council of Medicine,



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is the initial milestone of publications in the area, without interruption since 1993, its selection as object of present work is justified. The objective is to know how authors are building bioethical knowledge, analyzing contents of articles published in Bioética Magazine during the last eight years (2001-2008).

#### Method

The sample comprised 16 issues of *RevistaBioetica* published during the period of 2001 to 2008. All publications in them were analyzed – either those of *Symposiums and Original articles* kind, prevailing until 2007, or those classified as *Original articles and Updating*, etc. – and their articles were distributed in three categories: 1) Regarding used method; 2) Regarding main approach; 3) Related to key-words.

Regarding the first of these analytical milestones – used method - data were classified as theoretic-conceptual (T-C), quantitative empirical (E-QT), qualitative- empirical - (E-OL) and combinations of one or more methods. The second analyzed variable - main approach of articles - was set after independent reading of each undertaken by authors who tried to identify the prevalent approach; Philosophy (F), Law (D), Medicine (M), Interdisciplinary (I) and Others (O). The approaches in F, D and M computed isolated or in combinations, according to each observation. Approach 1 was reserved specifically to contents with interdisciplinary features and not contemplated in several combinations between F, D and M. Category O was reserved to non-specified approaches, that is, not F, M, D or I. Regarding the key-words, the third analyzed variable, tabling of all key-words mentioned by authors themselves in their works was undertaken.

## **Concepts and definitions**

Categorization in methods and approaches was, isolate, undertaking by one of the authors (DNOF) though selected

Reading, and later, reviewed by the other (ESA), in speed reading 4.5.6, with reevaluation of cases in disagreement.

## Category T-C

To theoretic-conceptual category was attributed those works build up through the search of the *development of a confrontation thought with other already constituted and finished thoughts* <sup>6</sup>. Thus, articles whose contents consisted on theoretical reflections on any ethical and/or bioethical situations, enriched with authors own thoughts, without inclusion of outcomes derived from collection of any empirical data, directed to category T-C.

## Category E-QT

The description of empirical data collection methods characterized by use of quantitative variables and their respective descriptive and/or statistical treatment of outcomes were directed to category E-QT <sup>7</sup>.

## Category E-QL

Empirical methods centered in qualitative variables aiming at understanding ethical and/or bioethical characterized articles considered as E-QL <sup>7,8</sup>.

## **Approaches**

Title analysis and content reading of articles directed their categorization by approach in one of the following areas: Medicine, Philosophy, Law, their combinations, and Interdisciplinary. While there was not specificity to any of the four approaches,

But allowing identification of other area(s) of knowledge, the article was characterized as *Others* approach and noted in respective areas (Ex: Nursing, Teaching, Technology, Dentistry, etc.). Directed to bioethics category was specific for articles whose contents were on recognized knowledge as specific of the discipline Bioethics (principles, foundations, etc).

## **Key words**

All key words of each publication were noted down. Next, one of them was selected as the most representative of the approach (Ex: psychiatry, dysthanasia, violence, etc.), or *two* words with single meaning (assisted reproduction, mental disease, informed consent, clinical research, etc.). Selection of most representative key word (single or double) also required that it to be cited in the enunciation of article title.

At the final stage, it was proceeded categorization of each article in view of type of content, approaches, and key words.

### **Results**

# Categorization by methods

149 articles of the *Bioética Magazine* were studied – from vol. 9, no. 1, year 2001, to vol.16, no. 2, year 2008 –, adding up to 16 issues. Total number of article per issue varied from 7 to 12. 127 (85.2%) theoretic-conceptual type articles, and 22 (13,8%) experimental, while these last 8 (36.4%) were quantitative, and 14 (63,6%) were qualitatives.

## Categorization by approach

Eight categories of approach created: Medicine, Philosofy, Law, Interdisciplinary, Medicine and Philosophy, Medicine and Law, Law and Philosophy, Others. Table 1 presents article distribution by approach, in decreasing order of occurrence.

**Table 1** Articles distributed by approach area, number of observations and percentage

Approach	Number of articles	%
Interdisciplinary	38	25.5
Medicine	37	24.8
Others	28	18.8
Medicine and Philosophy	22	14.8
Medicine and Law	15	10.1
Philosophy	5	3.3
Law	3	2.0
Law and Philosophy	1	0.7
Total	149	100.0

Source: Bioética Magazine - CFM, articles publishe from 2001 to 2008.

## Categorization by key word

It was possible, analyzing the meaning of 146 selected key words, to categorize them in 10 thematic groups: Ethics/Bioethics; CEP/Research Ethics; Social issues; Medical expertise/Diseases; Begin of life; End

of life; Bioethics/Ethics Teaching;

Nursing care /assist; Others; Articles without key words (three articles under this circumstances). Table 2 shows, by order of frequency, key word(s) comprising each thematic group, number of occurrence and frequencies.

**Table 2**. Distribution, in thematic groups, key-word(s) of greater adherence to the approach of each article

Thematic Group	Key word(s) of greater adherence to approach of each article (one per article)	Total of key words	%
1. Ethics/Bioethics	Case analysis / Autonomy / Bioethicsethics / Bioethics (2) / Bioethics intervention / Bioethics principles / Bioethics protection / Bioethics Committee / Confidentiality (2) / Code / Codes/ Dignity (2) / Human rights / Medical ethics (2) / Justice / Physician-patient (2) / Medical Practice	27	18.1

Continua

Continued from Table 2

2. CEP/Ethics in research	CEP / Conflict of interest / Informed consent (3) / Consent (2)/ Declaration of Helsinki / Ethics animals / Human Experiments/ Therapeutic trials / Ethicsresearch (3) / Research animals / Medical research (2) / Clinical Research (2) / Protocol research/ Research	21	14.1
3. Social issues	Communication / Feminism / Gender (4) / Information / Irrationalism / Judicial-pe- nal / Publications / Social assistance/ Medical work / Transhumanism / Violence (7) / Voluntariat	21	14.1
4. Medical expertise/Dis eases	Early Cavity / Breast cancer (2) / Mental diseased / Mental defficiency / Genetics / Gerontology / HIV / HPV / HIV-Aids / Medicine evidences (2) / Musictherapy / Medicine family / Psychiatry (2) / Male pseudo-hermafroditism / Collective health / Psychic suffering	19	12.8
5. Beginning of life	Anencephalia / Beginning of life / Clonning / Pre-natal diagnosis / Embryo / Pregnancy / Freedom of breeding / Neonatology / Assisted reproduction (7) / Human reproduction / Reproductive Technologies (2)	18	12.1
6. End of life	Palliative care / Dysthanasia / Elders / Death (4) / Maternal mortality / Orthothanasia / Terminal patient (2) / Terminality of life (2)	13	8.7
7. Ethics/Bioethics Teaching	Medical teaching / Medical Ethics Teaching / Bioethics teaching (5) / Continued education / Ethics teaching (2) / Medical formation / Professional formation	13	8.7
8. Nursing care /assist	Attenuate suffering / Cure-care taker / Care takers-sharing/ Care takers (3) / Care taker (3) / Care / Hospital humanization	11	7.4
9. Others	Body / Emotions/ Hypnosis	3	2.0
10. Articles without key words		3	2.0
Total		149	100.0

Source: Bioética Magazine – CFM, articles published from 2001 to 2008.

### **Comments**

Seen results indicate that Revista Bioética. published by CFM, during the period of 2001-2008, had its publications produced markedly by theoretic-conceptual methodology 85.5%). This observation deserves reflections on themselves: first, it is a magazine published by medical entity. Medicine, by tradition, is an area for experimental knowledge production deeply funded in quantitative Cartesian methods. Even though philosophical thought produces knowledge through eminently theoreticalconceptual methods, percentage of Philosophy articles was only 3.3% of publications. One concludes that use of theoretic-conceptual methodologies Revista Bioética acquired already, between authors, philosophers or not, it own expression.

Secondly, as Revista Bioética is the most traditional and highly esteemed publication in Bioethics in Brazil, it is possible to infer that the high percentage of theoreticconceptual publications seen reveals Brazilian tendency to produce knowledge in bioethics. If this inference is correct, Brazil. regarding publication methods in bioethics, is similar in seen medical ethics and bioethics publications in Belgium, where 4,029 analyzed article during the period of 1990 to 2003 <sup>9</sup> just 10.8% used empirical methodological design. In the remaining ones, 89.2%, there is no evidence of data collection and analysis, according to authors 9. Comparable outcomes were seen in research, which studied 19,486 publications

From *Bioethicsline* database, during the period of 1980 to 1989, out of which just 3,4%, that is, 663 publication were identified as resulting from empirical research in medical ethics <sup>7</sup>.

Observation that areas with higher frequency of approach were Interdisciplinary (25.5%) and Medicine (24,8) is not surprising regarding medical area, but, in relation to interdisciplinarily, it reveals that Brazilian authors, in large measure, are building bioethics knowledge within its basic conception, that is, without knowledge territorial limitation imposed by disciplines and/or specializations.

In 1996, Brazil turned over its ethics history page with the establishment of CEP-Conep, with Resolution no. 196/96 of CNS/MS <sup>10</sup>, and, subsequently, it enlarged research ethics committees network (CEP) throughout national territory, building a new ethics awareness in the country regarding use of human beings in researches. Publications analyzed in this work reflect this change: 14.1% of articles dealt with CEP and/or Research Ethics with human beings issues.

Finally, a general overview of Table 2 allows concluding that bioethics in Brazil, seen from 149 analyzed articles, does not limit to health sector issues, but it reveals nation's awareness about social problems (14.1%), such as violence and gender issues. *Revista Bioética* tradition in publications dealing with specific symposiums translates domestic demand identified by its editorial board. Thus, the existence of articles

Dealing with simposium topics does not Imply in loss of information identity related to *Revista Bioética* thematic priorities revealed in current work.

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#### Resumen

Métodos y enfoque en la producción de conocimientos en materia de bioética, los años 2001-2008, en la Revista Bioética del CFM (Consejo Federal de Medicina), Brasil

Se examinaron los 149 artículos publicados en la *Revista Bioética* – CFM en el período 2001 a 2008. Tres variables fueron analizadas en cada artículo: el método científico, enfoque principal y palabras-clave considerando la más adherente a la atención y también cuando presente en el enunciado del título. Los resultados mostraron que 127 artículos (85,2%) fueron producidos por el método teórico-conceptual, y 22 (14,8%) por el método experimental. Entre estos, 8 (36,4%) eran empíricos cuantitativos y 14 (63,6%) de calidad. El foco interdisciplinario fue el más frecuente (25,5%), seguido por un enfoque en la Medicina (24,8%). Dos simultáneos enfoques en Medicina y Filosofía (14,8%), y Medicina y Derecho (10,1%) superó enfoques aislados en Filosofía (3,3%) y en Derecho (2,0%). Palabras clave fueron distribuidas en diez grupos temáticos, siendo Ética/Bioética (18,1%); CEP/Ética en la investigación (14,1%) y las Cuestiones Sociales (14,1%) los grupos con mayor frecuencia. Cuanto al tipo de método, los resultados son comparables a los observados en las investigaciones internacionales. Foco y palabras clave muestran una considerable atención a las cuestiones de bioética en Brasil. Se llegó a la conclusión que la construcción de conocimientos en la *Revista Bioética* – CFM se centra en la interdisciplinaridad y permanece atenta a los problemas nacionales de bioética.

Palabras-clave: Publicaciones seriadas. Bioética. Brasil.

### Abstract

Methods and approaches in producing bioethics articles, from 2001-2008, in Revista Bioética do CFM (CFM - Bioethics Magazine) published by the Federal Council of Medicine – CFM, in Brazil

A total of 149 articles in *Revista Bioética do CFM* (CFM Bioethics Magazine) published from 2001 to 2008, were analyzed in three variables: method, approach, and a key word most adjusted to the subject and present in the title also. The results showed that 127 (85.2%) articles used conceptual methods, and 22 (14.8%) experimental ones. From the latter, 8 were quantitative (36.4%), and 14 (63.6%) qualitative. The interdisciplinary approach was the most frequent (25.5%), followed by Medicine (24.8%). Two simultaneous approaches, such as Medicine and Philosophy (14.8%), and Medicine and Law (10.1%) were more frequent than isolated subject approaches such as Philosophy (3.3%) and Law (2.0%). Key words distributed in ten categories, while Ethics/Bioethics (18.1%), IRB/Research Ethics (14.1%), and Social issue (14.1%) the most frequent ones. In regards to method type, outcomes are comparable to those observed in international research. The approaches and keywords show considerable attention to bioethical issues in Brazil. The conclusion is that dissemination of knowledge by *Revista Bioética - CFM* (CFM - Bioethics Magazine) highlights interdisciplinary method, and it is aware of Brazilian bioethical issues.

Key words: Serial publications. Bioethics. Brazil.

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