ADESÃO TERAPÊUTICA EM IDOSOS HIPERTENSOS: REVISÃO INTEGRATIVA

THERAPEUTIC ADHESION IN HYPERTENSIVE ELDERLY PEOPLE: INTEGRATION REVIEW

TERAPIA DE ADHESIÓN EN ANCIANOS HIPERTENSOS: REVISIÓN INTEGRADORA

Fernanda Machado Pinheiro¹, Fatima Helena do Espirito Santo², Renata Miranda de Sousa³, Jaqueline da Silva⁴, Rosimere Ferreira Santana⁵

RESUMO

Descritores: Idoso; Hipertensão; Cuidados de enfermagem; Adesão à medicação.

ABSTRACT
Objective: to identify evidence of therapeutic adherence in hypertensive elderly patients. Method: This is an integrative review. Data collection took place in the second half of August 2015 in the LILACS, MEDLINE databases via PUBMED and SCIELO, using the descriptors: “Elder”, “Hypertension”, “Nursing care”, “Medication adherence”, and the and Boolean operator for the crossings. The analysis show 20 publications. Results: In order to improve self-care behaviors, nurse’s guidance by the nurse to the elderly patient is a strategy to improve therapeutic adherence. Conclusion: The evidence on therapeutic adherence in hypertensive elderly patients relates to the development of non-communicable chronic diseases and the elderly person’s lifestyle. Strategies involving attitudes and behaviors of the elderly people may favor participatory behavior that contributes to an adequate therapeutic adherence.

Keywords: Elder; Hypertension; Nursing care; Medication adherence.

RESUMEN
Objetivo: identificar evidencias sobre adherencia terapéutica en ancianos hipertensos. Método: Se trata de una revisión integrativa. La recogida de datos se produjo en la segunda mitad de agosto de 2015, en las bases de datos LILACS, MEDLINE via PubMed y SCIELO. Se utilizaron las siguientes palabras clave: “Ancianos”, “Hipertensión”, “Atención de enfermería” y “Adherencia al tratamiento” y el operador booleano para los cruzamientos. Para el análisis, se presentan 20 publicaciones. Resultados: Con ganas de mejorar el comportamiento de auto-atención, asesoramiento por personal de enfermería a pacientes de edad avanzada es una estrategia para mejorar la adherencia. Conclusion: Se encontró que las evidencias sobre la adherencia en pacientes hipertensos de edad avanzada están relacionadas con el desarrollo de enfermedades crónicas y el estilo de vida de las personas ancianas. Las estrategias que implican actitudes y comportamiento de las personas de edad avanzada pueden favorecer una forma de participación que contribuye a una adecuada adherencia terapéutica.

Descritores: Anciano; Hipertensión; Atención de enfermería; Adherencia a la medicación.


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INTRODUCTION

Non-communicable chronic diseases (NCDS) are characterized by prolonged evolution time, with early detection and appropriate treatment, as well as effective prevention\(^1\). Among the NCDS, cardiovascular diseases are the main cause of morbidity and mortality in the Brazilian population, and, among the elders, hypertension is a highly prevalent disease, affecting approximately 50% to 70% of the people in this age group\(^{1-3}\).

Hypertension is one of the most important risk factors for the development of cardiovascular, cerebrovascular and renal complications, being responsible for at least 40% of deaths from cerebrovascular accident, for 25% of deaths from coronary artery disease, and, in combination with diabetes mellitus, 50% of the cases of terminal renal failure\(^1\). Considered a silent and aggressive disease, which depends on the cooperation and active participation of the subject, non-adherence to the therapeutic measures and the possibility of complications become worrying\(^2\).

However, adherence is considered a complex behavioral process heavily influenced by the environment, individual, health professionals, medical assistance, that cover the biological, psychological, socioeconomic and cultural dimensions\(^4\). In a study\(^5\) on adherence in hypertensive elderly patients, 42% were unaware of the chronic nature of hypertension and believed in the healing of essential hypertension and 20% did not know that hypertension increases the risk of cardiovascular morbidity and mortality.

In this sense, one of the consequences of non-adherence to the treatment of hypertension is hospitalization. A study\(^2\) about the prevalence of hospitalization for injuries or complications of arterial hypertension found that, of 422 individuals, 51 (12.08%) reported hospitalization in the last year for injuries or complications of hypertension. Thus, hospital scenario geriatrization indicates a state of increased vulnerability associated with an increased risk of adverse outcomes such as clinical delirium, functional decline, mobility impairment, falls, social withdrawal, increased morbidity and mortality\(^3\).

Therefore, strategies for managing the disease and adherence of the hypertensive elder, in order to maintain a satisfactory state of health condition, may reduce the need for hospitalizations, hospital stay, reduction of hospital costs and, perhaps, improve the humanistic outcomes and quality of life. Non-adherence and its related factors indicate features that can assist appropriately and effectively in the definition of an intervention, minimizing the vulnerability arising from conditions of treatment and control of hypertension.

In this sense, the study aims to identify evidence about adherence in hypertensive elderly patients. By identifying the conditions involved in the adherence of hypertensive elderly patients, this study expects to can draw effective healthcare plans that are more effective, focusing on the elders’ specificities. In this way, the research question is: "What is the evidence identified in bibliographic production about therapeutic adherence in hypertensive elderly patients from 2012 to 2015?"  

METHOD

This is an integrative review. This method allows synthesizing previous researches, enabling to obtain results on a specific theme. In accordance with other methodologies, the integrative review requires accuracy, transparency and replication used in the analyzed primary studies\(^6\).

The achievement of this type of research imposes standards that recommend the following steps: 1) formulation and identification of the research problem; 2) data collection; 3) data evaluation (variables); 4) data analysis and interpretation; 5) presentation of the results\(^6\).

Data collection occurred in the second half of August 2015, developed in the VHL - Virtual Health Library, which stores scientific records of databases selected for review. They are LILACS (Latin American and Caribbean Literature in Health Sciences), MEDLINE (International Literature in Health Sciences) via Pubmed and SCIELO (Scientific Electronic Library Online).

The search was performed using the descriptors according to DeCS - Virtual Health Library (VHL): "Elder", "Hypertension", "Nursing Care" and "Medication adherence", and the Boolean operator and was used for the crossings. The search strategy occurred by crossing pairs of descriptors without qualifiers, as described:
"Elder" AND "Hypertension", "Hypertension" AND "Nursing Care", "Medication adherence" AND "Hypertension", "Medication adherence" AND "Nursing Care", "Elder" AND "Medication adherence". Clinical aspects or type of study were not used for selecting journals.

In this sense, the period of publication of articles selected for the collection was from 2012 to 2014. The exclusion criteria were articles not available online and articles that focused on non-cardiovascular health grievance. The search presented, after refinement upon reading the abstracts and exclusion of duplicates, 22 publications for analysis.

Table 1 shows the search strategy, corresponding to the number of articles submitted after selection of filters of interest (Table 1).

Table 1 - Selection of articles; August, 2015.

<table>
<thead>
<tr>
<th>Elder AND Hypertension</th>
<th>Hypertension AND Nursing Care</th>
<th>Medication adherence AND Hypertension</th>
<th>Medication adherence AND Nursing Care</th>
<th>Elder AND Medication adherence</th>
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</thead>
<tbody>
<tr>
<td>Presented</td>
<td>69462</td>
<td>1939</td>
<td>4733</td>
<td>415</td>
</tr>
<tr>
<td>Magazine theme Nursing</td>
<td>856</td>
<td>1147</td>
<td>335</td>
<td>254</td>
</tr>
<tr>
<td>Main theme Elder, Hypertension, Nursing Care and Medication adherence</td>
<td>517</td>
<td>662</td>
<td>266</td>
<td>127</td>
</tr>
<tr>
<td>Elder limit</td>
<td>457</td>
<td>127</td>
<td>100</td>
<td>34</td>
</tr>
<tr>
<td>Available</td>
<td>202</td>
<td>49</td>
<td>58</td>
<td>27</td>
</tr>
<tr>
<td>From 2011</td>
<td>122</td>
<td>27</td>
<td>37</td>
<td>21</td>
</tr>
<tr>
<td>Did not discuss the theme</td>
<td>98</td>
<td>16</td>
<td>25</td>
<td>19</td>
</tr>
<tr>
<td>Duplicates</td>
<td>22</td>
<td>1</td>
<td>4</td>
<td>0</td>
</tr>
<tr>
<td>Total</td>
<td>2</td>
<td>10</td>
<td>8</td>
<td>2</td>
</tr>
</tbody>
</table>

Source: Research data. 2015.

RESULTS AND DISCUSSION

Table 2 presents the bibliometric profile of the selected articles. This profile includes title of the publication, author, type of study, objective, magazine, year of publication and database where the article was published.

Table 2 - Bibliometric profile of the selected articles; August, 2015.

<table>
<thead>
<tr>
<th>Title</th>
<th>Author(s)</th>
<th>Type of study</th>
<th>Objective</th>
<th>Magazine</th>
<th>Year of publication</th>
<th>Database</th>
</tr>
</thead>
<tbody>
<tr>
<td>Risk factors and complications in patients with hypertension/diabetes in a regional health district of northeast Brazil</td>
<td>SANTOS; MOREIRA(7)</td>
<td>Documental, analytical, retrospective, with quantitative approach</td>
<td>To identify the risk factors and associated complications present in clients with hypertension/diabetes, enrolled in the HIPERDIA of the Executive Regional Health Department VI in Fortaleza, CE</td>
<td>Rev. esc. enferm. USP</td>
<td>2012</td>
<td>LILACS</td>
</tr>
<tr>
<td>Nurse-led disease management for hypertension control in a diverse urban community: a randomized trial.</td>
<td>HEBERT; SIS; TUZZIO; CASABIANCA; POGUE; WANG; CHEN; COWLES; MCLAUGHLIN MA(16)</td>
<td>Randomized-controlled study</td>
<td>Efficacy of a nursing intervention based on the specific needs of black and Hispanic patients in East and Central Harlem, New York City, who treated, but uncontrolled hypertension</td>
<td>J Gen Intern Med</td>
<td>2012</td>
<td>MEDLINE</td>
</tr>
<tr>
<td>Topic</td>
<td>Authors</td>
<td>Methodology</td>
<td>Study Objectives</td>
<td>Journal/Database</td>
<td>Year</td>
<td>Database</td>
</tr>
<tr>
<td>----------------------------------------------------------------------</td>
<td>------------------------------------------------------------------------</td>
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</tr>
<tr>
<td>Compliance with outpatient clinical treatment of hypertension</td>
<td>GOMES E MARTINS; CHAVAGLIA; BARBUCI OHL; MARTINS; GAMBA(4)</td>
<td>Cross-sectional study</td>
<td>To analyze the compliance with outpatient clinical treatment of arterial hypertension in the population assisted by a Family Health Strategy unit</td>
<td>Revista de Enfermagem do Centro-Oeste Mineiro 2018; 8/1938</td>
<td>2014</td>
<td>LILACS</td>
</tr>
<tr>
<td>Blood pressure control and adherence/attachment in hypertensive users of primary healthcare</td>
<td>SILVA; PAES; FIGUEIREDO; CARDOSO; SILVA; ARAUJO(19)</td>
<td>Descriptive and analytical study</td>
<td>To assess the association between blood pressure control and sociodemographic variables, follow-up, adherence and attachment of the user</td>
<td>Rev. esc. enferm. USP</td>
<td>2013</td>
<td>LILACS</td>
</tr>
<tr>
<td>Analysis of action plans and coping plans for reducing salt consumption among women with hypertension</td>
<td>AGONDI; GALLANI; CORNELIO; RODRIGUES(18)</td>
<td>Cross-sectional cutoff of naexperimental study</td>
<td>To describe action plans developed by women with hypertension to add no more than 4g of salt per day to food and to reduce consumption of salty foods, as well as to describe the perceived barriers.</td>
<td>Rev. Latino-Am. Enfermagem</td>
<td>2012</td>
<td>LILACS</td>
</tr>
<tr>
<td>Socio-demographic characteristics and quality of life of elderly patients with systemic arterial hypertension who live in rural areas: the importance of nurses’ role</td>
<td>TAVARES; PAIVA; DIAS; DINIZ; MARTINS(3)</td>
<td>Observation, analytical and cross-sectional research</td>
<td>To describe sociodemographic and quality of life characteristics of elderly patients with systemic arterial hypertension; to correlate quality of life with time of diagnosis and number of medications, as well as compare quality of life with the type of medication used.</td>
<td>Rev. Latino-Am. Enfermagem</td>
<td>2013</td>
<td>LILACS</td>
</tr>
<tr>
<td>The perception of hypertensive elderly patients regarding their health needs</td>
<td>MARIN; DA SILVA SANTANA; MORACVI(3)</td>
<td>Qualitative study</td>
<td>To analyze the perception of hypertensive elderly people on their health needs.</td>
<td>Rev Esc Enferm USP</td>
<td>2012</td>
<td>MEDLINE</td>
</tr>
<tr>
<td>Effectiveness of education in health in the non-pharmacological treatment of arterial hypertension</td>
<td>OLIVEIRA; MIRIAN; FERNANDES; CALDEIRA(4,5)</td>
<td>Intervention, randomized, uncontrolled study, of the prospective cohort type</td>
<td>To verify the efficacy of health education on the adherence to non-pharmacological treatment in arterial hypertension</td>
<td>Acta paul. enferm</td>
<td>2013</td>
<td>LILACS</td>
</tr>
<tr>
<td>Baseline medication adherence and blood pressure in a 24-month longitudinal hypertension study</td>
<td>SHAW; BOSWORTH H(27)</td>
<td>Randomized group analysis</td>
<td>To identify the viability and validity of a self-report measure of easy and fast adherence to medication</td>
<td>J Clin Nurs</td>
<td>2012</td>
<td>MEDLINE</td>
</tr>
<tr>
<td>Nursing actions increases the control of hypertensive</td>
<td>COLOSIMO; SILVA; TOMA; PIERIN(21)</td>
<td>Field, experimental, randomized</td>
<td>To assess the control of hypertensive people, using hbp and casual measure, and analyze</td>
<td>Rev Esc Enferm USP</td>
<td>2012</td>
<td>LILACS</td>
</tr>
<tr>
<td>Study Title</td>
<td>Research Question</td>
<td>Methodology</td>
<td>Journal</td>
<td>Year</td>
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<tr>
<td><strong>Personal characteristics and cognition in older African-Americans with hypertension</strong></td>
<td>To determine which personal characteristics were associated with cognitive difficulties in order to identify the elders that needed environmental support to improve their self-management abilities.</td>
<td>Descriptive correlation inserted into a randomized controlled trial</td>
<td><em>J Natl Black Nurses Assoc</em></td>
<td>2011</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Nursing care to the client with hypertension: a bibliographic review</strong></td>
<td>To identify, in the knowledge production, nursing care practices in patients with hypertension in the last decade.</td>
<td>Bibliographic study of the literature review type</td>
<td><em>Rev Bras Enferm</em></td>
<td>2011</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Barriers to hypertension treatment</strong></td>
<td>To describe the barriers faced by people with hypertension for noncompliance to treatment and control the levels of blood pressure</td>
<td>Descriptive cross-sectional</td>
<td><em>Rev Bras Enferm</em></td>
<td>2011</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Adherence to treatment: a study with hypertensive outpatients</strong></td>
<td>To identify the profile of AH patients in outpatient follow-up, according to sociodemographic variables; to assess the adherence of the AH carrier to the drug treatment, to identify the factors that compromise adherence and to relate it to the control of blood pressure.</td>
<td>Descriptive study, with quantitative approach</td>
<td><em>UERJ Nurs. Jour.</em></td>
<td>2012</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Content validation of the dimensions constituting non-adherence to treatment of arterial hypertension</strong></td>
<td>To validate content of the constitutive dimensions of non-adherence to the hypertension treatment.</td>
<td>Methodological, quantitative study</td>
<td><em>Rev Esc Enferm USP</em></td>
<td>2013</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>The use of validated questionnaires to measure adherence to arterial hypertension treatments: an integrative review</strong></td>
<td>To analyze the scientific production in collective health regarding which validated questionnaires are being used to evaluate adherence to hypertension treatments</td>
<td>Integrative literature review</td>
<td><em>Rev. esc. enferm. USP</em></td>
<td>2012</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Clinical validation of the nursing diagnosis &quot;noncompliance&quot; among people with hypertension</strong></td>
<td>To validate clinically the nursing diagnosis &quot;Lack of adherence&quot; in people with hypertension.</td>
<td>Methodological study</td>
<td><em>Esc Anna Nery</em></td>
<td>2013</td>
<td></td>
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</tr>
</tbody>
</table>
Changes in life style of hypertensive people are, perhaps, the greatest difficulty in treatment adherence, by involving diet, physical activity, abstaining from alcoholic beverages and tobacco\(^\text{2,4,7,8}\). That is, changes in life style, for example, impose care with diet, alcohol intake, smoking cessation, weight maintenance, performing regular physical activity\(^\text{2,4,7-9}\).

Health professionals need to understand that adherence to the hypertension treatment by elderly patients is a complex issue that rests on four interdependent dimensions that need to be systemically understood: person, disease/treatment, health service and environment\(^\text{10}\).

The studies analyzed the time of diagnosis, how the disease was discovered, type of medication, reasons for interrupting medications, habit to measure blood pressure and consumption of salt in food\(^\text{10}\), hyponatremic and hypolipidic food\(^\text{8,9}\), family history\(^\text{7}\) and pharmacotherapeutic profile (number of types of medications used, total number of pills used per day, number of times a day that of medicine use, among others\(^\text{8,11-14}\)). In another study, the information collected from medical records were: results of the last three measurements of blood pressure, weight, height and pharmacological treatment prescribed\(^\text{8}\).

A study\(^\text{15}\) on clinical validation of the diagnosis "Lack of Adherence" in hypertensive patients selected participants with the following criteria: medical diagnosis of hypertension for at least a year, and being in drug treatment for hypertension for at least six months. This indicates that, the greater the duration of treatment and the occurrence of adverse effects arising from drug treatment, more negative is the interference in adherence, stressing the importance of early identification of conditions that may affect the therapeutic adherence\(^\text{15}\).

A study corroborates it\(^\text{13}\) by reporting, as an important factor, the relationship between the duration of treatment and the systematic use of medications, since the greater the time, the lower the use of drugs, especially in elders.

The evaluation of the influence of medication on quality of life of hypertensive patients is essential in the search for alternatives to greater adherence\(^\text{13,14}\). In relation to adherence to drug treatment, in general, 21 (28%) patients with arterial hypertension showed...
adherence by the Morisky and Green Test and 54 (72%) showed no adherence (score in test ≤3)\(^\text{14}\).

Thus, studies used the scale of the Morisky-Green\(^\text{4,10,12,16,17,28}\) and phone monitoring\(^\text{16}\) to monitor adherence to medication. In general, they showed low adherence to therapy in 70.7% for hypertension treatment, mainly related to forgetting to take the medicine\(^\text{4}\). However, a study\(^\text{10}\) with frail elders reports that they require a greater amount of prescribed medications; therefore, they need a thorough evaluation regarding the prescription of multiple medicines and adverse effects.

Therefore, for the continuity of the hypertension treatment, dose and route of application, its effects, level of confidence and relationship between client and professional and facilities of access to health services also associate with the quantity of drugs prescribed\(^\text{8,12-14,16}\). A study\(^\text{8}\) about barriers to hypertension treatment, showed that, while 69 interviewees practiced monotherapy, the others were concomitantly using two drugs (134); three drugs (39); and four, more than three drugs\(^\text{8,12}\).

A study\(^\text{14}\) on adherence to treatment in hypertensive patients showed an average age of 61.5±10.36 years, and the number of medications daily used ranged from three to nine pills, with an average of 5.1 pills/patient. Of these, the antihypertensive ranged from one to six pills, with an average of three pills per day per patient.

The reasons for not following the treatment are complacency, associated disease, little security, lack of time, physical and mental wear to perform physical exercises; socioeconomic difficulties for adequate food; chemical dependence for quitting smoking and alcoholism. More specifically, the adverse effects of the drugs to the systematic use of medications\(^\text{8,13,14}\), which highlights the importance of pharmacological and pharmacodynamic knowledge of medicines in various systems regarding the aging process.

However, institutional factors may relate to the adherence, because it is not limited to attending consultations or correctly using prescribed medications, or transends the adoption of life habits in an isolated way\(^\text{19}\). The institutional bond should be considered more than the service itself or formal enrollment in a program, because it means the establishment of an ongoing, personal and non-transferable relationship in time. In this aspect, a study\(^\text{19}\) reports that elderly individuals with low educational level suggest greater difficulty presenting a critical view on how a service is organized to meet their needs for monitoring and adherence.

Thus, psychosocial, economic, educational factors and emotional stress help trigger and maintain the hypertension and may act as barriers to adherence to treatment and change of habits\(^\text{19}\).

In order to improve self-care behaviors, nurse’s guidance to the elderly patient is a strategy to improve therapeutic adherence\(^\text{16}\), reading food labels due to the importance of controlling salt and fat intake\(^\text{8,9,16-18}\). Reducing smoking and alcohol consumption should also be advised\(^\text{2,8,16}\). Controlling blood pressure levels is essential for correctly monitoring hypertension\(^\text{2,9,19}\). Performing physical activity is also advisable\(^\text{9}\).

Thus, the adherence to treatment includes therapeutic and educational factors, and aspects related to recognizing and accepting individual’s health conditions\(^\text{19}\). Generally, the treatment of patients with chronic disease should encourage adaptation to this condition, equipping them so that, through their own resources, they develop mechanisms that allow knowing their health-disease process in order to identify, avoid and prevent complications, injuries\(^\text{19}\).

In this sense, the elder’s multidimensional assessment is necessary to develop clinical interventions and strategies to prevent or minimize the occurrence of adverse effects in elderly patients\(^\text{10}\). Therefore, some nursing interventions focused on the elderly patient, and on other people with hypertension, are: Establishment of confidence in the team, because the attitudes adopted by health professionals, such as popular language, demonstration of respect for the patient’s beliefs\(^\text{14,15,20}\) and friendly service trigger more confidence in them, improving the adherence; encouragement of support networks (family, friends, close people)\(^\text{10,11,15-20}\), providing guidance about the disease and treatment; simplifying the therapeutic scheme; facilitation of accessibility to the health system and health resources\(^\text{8,12-16}\). Behavioral change\(^\text{13,16}\); Permanent health education and involvement of the patient and his/her family with the therapy\(^\text{15,21}\).

However, the use of nurses’ monitoring by phone appears as promising, indicating that it can promote behavioral change and advice to
promote the therapeutic adherence in elderly people(16,22).

Thus, guidelines involving knowledge, behavioral change and disease management are beneficial actions; however, they should take into account the hypertensive elder’s biopsychosocial(23-24) and cultural(24-25,26-27) issues.

**CONCLUSION**

The evidence about adherence in hypertensive elderly patients relate to the development of non-communicable chronic diseases and the elderly person’s life style. The perception of the multidimensional aspects that involve the aging process requires attention in evaluations and interventions involving the elder’s health. Nevertheless, strategies that involve childcare, health education and behavioral change may encourage a participatory behavior that contributes to the adequate therapeutic adherence.

Some limitations of the study are gaps between interventions and their monitoring over time to measure the effectiveness of interventions on adherence. Future studies should be developed to analyze the variables involved in factors related to adherence and insertion of interventions that follow and monitor these variables in the quality of life of hypertensive elderly patients.

**REFERENCES**


13 Moura DJM, Bezerra STF, Moreira TMM, Fialho AVM. Cuidado de enfermagem ao cliente com hipertensão: uma revisão bibliográfica. Rev Bras...
https://doi.org/10.12957/reueri.2012.3979

https://doi.org/10.5935/1414-8145.20130003

https://doi.org/10.1007/s11606-011-1924-1

https://doi.org/10.1111/j.1365-2702.2011.03859.x

https://doi.org/10.1590/S0104-11692012000300009

https://doi.org/10.1590/S0080-62342013000300009

https://doi.org/10.1590/S0104-11692013000200007

https://doi.org/10.1590/S0080-62342012000700002


http://dx.doi.org/10.1590/S0080-62342013000500010


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Mailing address:
Fernanda Pinheiro
Street Dr. Celestino, nº 74 Centro