The Portrayal of Occupational Therapy and Occupational Science in Canadian Newspapers: A Content Analysis

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Abstract: The primary goal of occupational therapy is to enable people to participate in the activities of everyday life [1]. The demand for occupational therapists in Canada is expected to grow sharply at an annual growth rate of 3.2%, compared to 0.7% for all occupations. At the same time, it is believed by occupational therapists in Canada that the Canadian public does not understand the role of occupational therapy. Occupational science is an emerging basic science field that supports the practice of occupational therapy. Given that newspapers are one source the public uses to obtain information and that newspapers are seen to shape public opinions, the purpose of this study is to investigate how “occupational therapy” is covered in Canadian newspapers from the term’s first appearance in 1917 until 2016 and how “occupational science” is covered from the term’s first appearance in 1989 to 2016. We interrogated the findings through the lens of three non-newspaper sources—two academic journals: Canadian Journal of Occupational Therapy (CJOT) and Journal of Occupational Science (JOS); and one Canadian magazine: Occupational Therapy Now (OTN). We found that medical terms were prevalent in the newspaper articles covering occupational therapy similar to the presence of medical terms in the CJOT and OTN. However, the newspapers missed contemporary shifts in occupational therapy as evident in the CJOT, OTN and JOS—such as the increased engagement with enablement, occupational justice and other occupational concepts. The newspapers also failed to portray the societal issues that occupational therapy engages with on behalf of and with their clients, and the newspapers did not cover many of the client groups of occupational therapy. Occupational science was only mentioned in n = 26 articles of the nearly 300 Canadian newspapers covered with no concrete content linked to occupational science. The scope of occupational therapy presented in Canadian newspapers may be one contributing factor to a situation where occupational therapists in Canada think that there is lack of public understanding around their role, as readers are not getting the full picture and as such approach occupational therapy with different expectations. Given the lack of coverage of occupational science, readers will likely obtain limited knowledge about occupational science and its focus.

Keywords: occupational therapy; portrayal of occupational therapy; occupational science; portrayal of occupational science; newspapers; Canada

1. Introduction

The primary goal of occupational therapy is to enable people to participate in the activities of everyday life [1]. Occupational therapy is seen as a benchmark profession crucial to the development of society and for addressing contemporary and future societal issues [2]. The demand for occupational
therapists in Canada is expected to grow sharply at an annual growth rate of 3.2%, compared to 0.7% for all occupations [3]. At the same time, it has been and it is still thematized that the Canadian public does not understand the role of occupational therapists in Canada [4–9] and public awareness campaigns have been and still are seen as needed [10,11]. Occupational science is an emerging basic science field that supports the practice of occupational therapy [12–14]. Triggered by the voiced concerns of Canadian occupational therapists that Canadians have a lack of understanding about the role of occupational therapists in Canada [4–9], given that occupational science is seen to support occupational therapy [12–14] and that newspapers are known to shape public opinion [15] the purpose of this study is to interrogate the coverage of occupational therapy and occupational science in Canadian newspapers through the lens of three non-newspaper sources—two academic journals: *Canadian Journal of Occupational Therapy* (CJOT) and *Journal of Occupational Science* (JOS); and one Canadian magazine: *Occupational Therapy Now* (OTN).

1.1. Occupational Therapy in Canada

Occupational therapy emerged as a result of historical events that took place to create its purpose and aim as a field at the beginning of the 20th century [16–20]. The effectiveness of occupational therapy practice was first documented in 1918 on patients experiencing shellshock [21]. Occupational therapists, whose role at the time was limited to being an aid, were qualified through basic medical instruction and equipped to teach arts and crafts [21]. Initially developed as a therapeutic application for war veterans and those institutionalized in mental hospitals, tuberculosis sanatoriums, and community workshops, in the 1920s, occupational therapy in Canada expanded its focus to therapeutic practice for children with disabilities and patients in general hospitals [22]. By World War II, the role of occupational therapy was gaining importance in Canada with focused efforts in “orthopaedic, neurological and psychiatric conditions with returning soldiers” [16]. Canada in the 1950s and 1960s saw a burst in occupational therapy research and increased academic attention and organizations began to incorporate occupational therapy into their programs [17]. Since 1963, occupational therapy in Canada is seen to do “more than have a patient return to his previous level for we seek to help him grow and develop, to make use of all of his abilities and thus more effectively realize his potential” [23]. As such, to realize one’s potential is not only about physical health, but to have meaningful occupation in their own environments with dignity and independence [23]. The 1970s brought more changes to the field of occupational therapy in Canada when it became organized nationally and when the field was reinforced in the educational system. Research was incorporated into university programs where new methods of practice and services were considered and provincial legislations were enacted to standardize occupational therapy [18]. The scope of occupational therapy in Canada continued to expand in the 1980s, when occupational therapists were “challenged to advocate on behalf of the growing number of people living with chronic illness and disability” [24] and “to expand their scope of influence to administrators, politicians, the public and other health professionals by taking a global interest in the world around them” [24]. From 1991 to 2001, occupational therapy in Canada shifted further away from a medical perspective and towards the promotion of well-being, enablement, person-centered services, evidence-based practice and community-based practices with new roles in companies, greater government relations, and greater access to emerging technology [19].

Some of the social issues occupational therapists are engaged with in the 21st century include enablement and empowerment [25]; employment; marital breakup; child care [26]; housing; education; elder abuse; injury prevention in older drivers; fall prevention [27], forced migration; substance abuse; addictions; culturally marginalized groups; social rights; occupational justice; human rights [28]; unstable housing [29]; social injustice [30]; and social inclusion [31]. On the webpage of the Canadian Association of Occupational Therapists, two documents, one from 2013 and one from 2012 [32,33], are highlighted as being useful to help occupational therapists define their practice [34]. Drawing from these two documents, the CAOT webpage lists seven roles of occupational therapists: (a) Expert in enabling occupation; (b) Communicator; (c) Collaborator; (d) Practice manager; (e) Change agent;
(f) Scholarly practitioner and (g) Professional. Essential elements of occupational therapy practice identified on the CAOT webpage are: (a) Presence of an occupational challenge; (b) Possibility of solutions that enable occupation; (c) Client-specific goals/challenges/solutions and client-centered enablement; (d) Multidisciplinary knowledge base and (e) A reasoning process that can deal with complexity [34]. The 2012 document [33] lists various competencies; the ones that include “social” are: (a) Apply relevant and current knowledge of the physical, social, psychosocial, environmental, and fundamental biomedical and social sciences to practice; (b) Analyze physical, cultural, social, and institution environmental impact on occupational engagement issues; (c) Incorporate cultural, social, physical, and institutional options to increase inclusion and (d) Balance the ethical and professional issues inherent in client advocacy, including altruism, autonomy, integrity, social justice, and idealism [33].

1.2. Occupational Science

Occupational science, a field that emerged in the 1990s, is envisioned as a basic science field that supports the practice of occupational therapy [12–14,35]. Occupational science is seen to assist in developing the understanding of the occupational nature of humans [14,36] and as a method of achieving social justice and social reform [37]. Polatajko and Davis state: “Occupational science is the systematic study of human occupation. It is a basic science dedicated to the understanding of human occupation, using both qualitative and quantitative traditions of inquiry. It is intended to be multidisciplinary, acknowledging the complexity of occupation” [38].

1.3. Occupational Therapy, Occupational Science and Public Perception

It has been and it is still thematized that the Canadian public does not understand the role of occupational therapists in Canada [4–9], and public awareness campaigns have been and still are seen as needed [10,11]. This can stem from different reasons; one reason could be that occupational therapy is not portrayed accurately in Canadian newspapers. Newspapers are known to shape public opinion [15] and to set agendas of how something is covered [39–48]. Newspapers have a “vital role to play in generating keyword recognition” for the general public [49] and play a role in increasing interest in a topic [50]. The role of media is significant in society as it presents groups of people in a certain way and shapes the way the public thinks about certain groups of people [51]. Parents, teachers, and career counselors who often give advice on career ideas of young adults [52,53] might also draw their information from newspapers [54]. How newspapers portray occupational therapy and the role of occupational therapists may influence an individual’s perception of the field. The purpose of this study is to interrogate the coverage of occupational therapy and occupational science in Canadian newspapers through the 2009–2016 content of three non-newspaper sources—two academic journals: Canadian Journal of Occupational Therapy (CJOT) and Journal of Occupational Science (JOS); and one Canadian magazine: Occupational Therapy Now (OTN).

2. Methodology

2.1. Data Sources

The following sources were used to fulfill the objective of the study. Two databases were used to retrieve newspaper articles from Canadian newspapers. First, ProQuest Canadian Newsstand Complete (referred to as CNC going forward), is an electronic database containing nearly 300 Canadian newspapers. Second, the ProQuest Historical Newspapers: The Globe and Mail (referred to as PGM going forward) contains a historical archive of news articles published by The Globe and Mail from 1844 to 2012.

Academic journal articles, excluding book reviews, were retrieved from one academic occupational therapy journal—The Canadian Journal of Occupational Therapy (CJOT), and one occupational science academic journal—Journal of Occupational Science (JOS).
Occupational Therapy Now (OTN) was the third source used. OTN is a magazine of the Canadian Association of Occupational Therapists which aims to publish articles targeted at the day-to-day practice of occupational therapists.

All documents were retrieved from these sources through the University of Calgary between 11 March 2016 and 13 March 2016.

2.2. Data Collection

2.2.1. Search Strategy for ProQuest Canadian Newsstand Complete (CNC) and ProQuest Historical Newspapers: The Globe and Mail (PGM) Databases

The search strategies outlined in Tables 1 and 2 were used for both CNC and PGM databases to retrieve newspaper articles that covered occupational therapy and occupational science. CNC database newspaper articles retrieved using Inclusion Criteria 1–3 were used for qualitative data analysis (Sections 3.2 and 3.3) and the newspaper articles retrieved using Inclusion Criteria 4 and 5 were used for quantitative data analysis (Section 3.1). PGM database newspaper articles retrieved using Inclusion Criteria 1 were used for qualitative data analysis (Sections 3.2 and 3.3) and the newspaper articles retrieved using Inclusion Criteria 2 were used for quantitative data analysis (Section 3.1).

Table 1. CNC Search Strategy for identifying articles for qualitative (Inclusion Criteria 1 to 3) and quantitative data analysis (Inclusion Criteria 4 and 5).

<table>
<thead>
<tr>
<th>Search Option</th>
<th>Inclusion Criteria 1</th>
<th>Inclusion Criteria 2</th>
<th>Inclusion Criteria 3</th>
<th>Inclusion Criteria 4</th>
<th>Inclusion Criteria 5</th>
</tr>
</thead>
<tbody>
<tr>
<td>Search terms</td>
<td>“occupational therapy”</td>
<td>“occupational science”</td>
<td>“occupational therapy” AND “purpose” OR “aim” OR “motivation” OR “objective”</td>
<td>“occupational therapy”</td>
<td>“occupational therapy”</td>
</tr>
<tr>
<td>Source type</td>
<td>All Newspapers</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Document type</td>
<td>Article, Commentary, Correspondence, Editorial, Essay, Feature, Fiction, Front Matter, Front Page/Cover Story, Letter to The Editor, News, Review</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Language</td>
<td>English</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Results</td>
<td>n = 437</td>
<td>n = 30</td>
<td>n = 506</td>
<td>n = 5169</td>
<td>n = 437</td>
</tr>
</tbody>
</table>

Table 2. PGM Search Strategy for identifying articles for qualitative (Inclusion Criteria 1) and quantitative data analysis (Inclusion Criteria 2).

<table>
<thead>
<tr>
<th>Search Option</th>
<th>Inclusion Criteria 1</th>
<th>Inclusion Criteria 2</th>
</tr>
</thead>
<tbody>
<tr>
<td>Search terms</td>
<td>“occupational therapy” AND “purpose” OR “aim” OR “motivation” OR “objective”</td>
<td>“occupational therapy”</td>
</tr>
<tr>
<td>Source type</td>
<td>All Newspapers</td>
<td></td>
</tr>
<tr>
<td>Document type</td>
<td>Front page article, Front Page, Letter to editor, Review</td>
<td></td>
</tr>
<tr>
<td>Language</td>
<td>English</td>
<td></td>
</tr>
<tr>
<td>Publication date range (Date Month Year)</td>
<td>1 January 1844–31 December 1979</td>
<td>1 January 1844–31 December 1979</td>
</tr>
<tr>
<td>Results</td>
<td>n = 26</td>
<td>n = 1150</td>
</tr>
</tbody>
</table>
2.2.2. Search Strategy for *Canadian Journal of Occupational Therapy* (CJOT) and *Journal of Occupational Science* (JOS) Academic Journals

All academic articles, excluding book reviews, published from the first issue of 2009 to the first issue of 2016, inclusively, were downloaded from CJOT and JOS. The results were $n = 218$ and $n = 203$ articles, respectively.

2.2.3. Search Strategy for *Occupational Therapy Now* (OTN) Magazine

All articles published from the first issue of 2009 to the first issue of 2016, inclusively, were downloaded from OTN. The result was $n = 471$ articles.

2.3. Data Analysis

All identified newspaper, academic, and magazine articles published after 1979 were downloaded as PDF documents and then uploaded to Atlas.ti®©, a qualitative data analysis software tool. The newspaper articles retrieved from the PGM database that were published before 1980 were downloaded as image files to a computer and the optical character recognition (OCR) function of the software Adobe Acrobat was used to make the images searchable and these files were uploaded into Atlas.ti®©.

2.3.1. Generating Search Terms

Data analysis began with generating a list of all the words present in the academic and magazine articles retrieved from CJOT, JOS, and OTN. The Word Cruncher function within the Atlas.ti®© software was run for each set of data collected from CJOT, JOS, and OTN. Word Cruncher generates an Excel file which contains a complete list of: all the words present in the documents, the total number of times the word appears in all documents (i.e., total word count), and the total number of times the term appears in each document. The terms were sorted from highest to lowest total word count for all documents, then the percentage was calculated for the number of articles that each word appears in at least once by the total number of articles.

Both authors sorted through the three lists of words generated by Word Cruncher independently first. The authors focused on words which appeared in 5% to 100% of articles, inclusively. Words were highlighted that were considered to indicate: (a) medical content and (b) clients of occupational therapy. Both authors compared their findings and any discrepancies were resolved through discussion.

The Auto Coding function of Atlas.ti®© was used to search for the term "social" in all the downloaded articles from CJOT and OTN ($n = 779$ articles). The $n = 3977$ quotes generated which contained the term "social" were read and coded for context, first individually by both authors. Individual findings were compared and any discrepancies were resolved through discussion. The agreed upon terms and phrases reflecting social issues affecting clients of occupational therapy and the field of occupational therapy were collected as search terms.

The Auto Coding function of Atlas.ti®© was used to search for the term "occupational" in all downloaded articles from JOS ($n = 203$ articles); all the phrases linked to the term “occupational” excluding the terms, “occupational therap*” or “occupational science” were collected as search terms. Both authors compared their findings and any discrepancies were resolved through discussion.

Hit Count Analysis of Search Terms in CNC, CJOT, JOS, and OTN

All of the terms generated from Section 2.3.1 that satisfied categories (a) medical terms; (b) clients of occupational therapy; (c) social issues affecting clients of occupational therapy and the field of occupational therapy and (d) phrases linked to the term “occupational” were searched for in each of the three sources (newspaper, academic articles, and magazine) to generate a percentage of the presence of a given term within the three sources (see Tables S1–S4 in Supplemental material).

The CNC database was visited on 13 March 2016 by both authors to conduct a search for newspaper articles containing the term “occupational therapy” and other parameters (see Table 1,
Inclusion Criteria 4 and 5) to determine the percentage of newspaper articles that contained each search term generated from Section 2.3.1. We used three publication date ranges for the CNC: 1980–2016, 2009–2016, and 2014–2016. The 1980–2016 range was used to give the overview for the whole time range available for the CNC. The 2009–2016 range was used to coincide with the time range of the academic and magazine articles downloaded from which we generated the search terms. The 2014–2016 range was used to coincide with the time range of the CNC occupational therapy articles used for qualitative analysis (Section 3.2). Both authors performed the searches on the same day (13 March 2016) to be able to ensure that both obtained the same results. We observed before that results can differ slightly between different days for the CNC database.

We used the PGM database to search The Globe and Mail from 1844 to the end of 1979 for articles which contained the term “occupational therapy” (see Table 2, Inclusion Criteria 2) to gain further historical reference. Again both authors performed the searches on the same day (13 March 2016) to be able to ensure that both obtained the same results.

For the articles downloaded from CJOT, JOS, and OTN from 2009 to 2016, the authors utilized the advanced search tool of the software Adobe Acrobat X (senior author) and the free version Acrobat reader (student) to generate the total number of articles that contained each search term. The authors used the advanced search engine of the Canadian Journal of Occupational Therapy to search for the presence of the words generated from the downloaded CJOT, JOS, and OTN within two timeframes (a) September 1933 (the first issue of the journal) to December 1979 and (b) January 1980 to December 2008. The 100% value was obtained by searching the same database just for the phrase “occupational therapy” in the journal name. All searches were performed by both authors on 22 April 2016.

The findings are presented in Tables S1–S4.

2.3.2. Content Analysis

The n = 437 occupational therapy-containing newspaper articles from 2014 to 2016 retrieved from the CNC database (see Table 1, Inclusion Criteria 1), were coded for the term “occupational” using the Auto Coding function in Atlas.ti7©. The n = 785 quotes gathered were read by both authors and coded in Atlas.ti7© in an inductive and iterative way and analyzed for context of the use of the term “occupational” in relation to occupational therapy. Both authors used one code to identify quotes that appeared to merely mention occupational therapy as a list of professions among others and one code to indicate that the article did not give any content related to occupational therapy. Other codes were generated during the inductive and iterative reading of the n = 785 quotes and grouped for themes. The two authors compared the results by reading to each other the Atlas.ti7© file and differences were resolved through discussions.

The n = 506 occupational therapy-containing newspaper articles from 1980 to 2016 retrieved from the CNC database (see, Table 1, Inclusion Criteria 3), were coded for the term “occupational” using the Auto Coding function in Atlas.ti7©. All the articles were read and analyzed for context of “occupational therapy” following the same procedure as described for the n = 785 quotes in the preceding paragraph.

The n = 33 articles retrieved from the PGM database (inclusion criteria see, Table 2 criteria 1), were coded for the term “occupational” using the auto-code function in Atlas.ti7©. The n = 56 quotes gathered were read and analyzed for context related to occupational therapy following the same procedure as described for the n = 785 quotes in a preceding paragraph.

The term “occupational science” was coded for the n = 26 occupational science-related newspaper articles retrieved from the CNC database (see Table 1, Inclusion Criteria 2), using the Auto Coding function in Atlas.ti7©. The resulting n = 38 quotes generated from this search were read and analyzed for context related to occupational science following the same procedure as described for the n = 785 quotes in a preceding paragraph.
3. Results

3.1. Portrayal of Occupational Therapists and Occupational Therapy (Frequency Count Approach)

Searching a given set of data for the frequency of terms present within the full text is one way to gain an idea about how a source portrays a topic. Our findings of the frequency of the generated search terms collected from Section 2.3.1 are presented in Tables S1–S4 (see supplementary material): Table S1 gives the results for phrases linked to the term “occupational”; Table S2 gives the results for the presence of medical-related terms; Table S3 gives the results for terms indicating clients linked to occupational therapy; and Table S4 gives the results for social issues and concepts mentioned in relation to clients of the occupational therapy field.

Tables S1–S4 are organized in the same way: column 1 contains the keywords and phrases searched for; columns 2–4 cover the results for the non-newspaper source CJOT for three timeframes (1933–1979, 1980–2008 and 2009–2016); columns 5–6 cover the non-newspaper sources OTN, and JOS, respectively for the years 2009–2016; columns 7–10 cover the two newspaper sources CNC and PGM. Columns 7–8 cover PGM before and since 1980. Columns 9–11 cover the CNC for different timeframes. These are 1980–2016, which is the whole timeframe available; 2009–2016 to mimic the timeframe we used to search the CJOT, OTN and JOS for keywords; and 2014–2016 to provide numbers for a timeframe of articles for which we also provided qualitative content. All the numbers reflect the percentage of articles mentioning a term whereby the percentage is derived by setting the total number of articles for each source as 100%. The keywords in Tables S1–S4 are all ordered by decreasing frequency of appearance in the CNC (1980–2016) dataset (column 9).

The data in the different columns can be used to compare data between different sources and timeframes.

To summarize some key findings of Tables S1–S4: Table S1 lists n = 27 phrases found in JOS articles that are linked to the term “occupational.” Of these n = 27 phrases, only “Occupational science” (0.4%) and “Occupational performance” (0.1%), were mentioned in the CNC 1980–2016 articles (column 9). These two terms are covered much more frequently in the 2009–2016 articles of the CJOT, OTN and JOS (between 20%–50%). Then there are phrases like “meaningful occupation” which is mentioned between 14%–40% or “occupational engagement” which is mentioned between 26%–48% in CJOT, OTN and JOS but not at all in the CNC 1980–2016 articles (column 9). Columns 2–4 show a change in vocabulary around occupational within the CJOT over time.

Table S2 lists n = 56 terms linked to a medical narrative. All n = 56 terms are mentioned in the CNC 1980–2016 articles (column 9), whereby n = 18 are mentioned in more than 10% of the CNC 1980–2016 articles (column 9). The frequency of appearance of many of the terms was similar between the CNC 1980–2016 articles (column 9) and CJOT, OTN and JOS articles; for example, CNC 1980–2016 articles (column 9) mentioned “hospital” in 48% of the articles whereby the range is between 52% in CJOT, 41% in OTN and 30% in JOS. “Patient”, “treatment”, “doctor”, “diagnosed”, “AIDS”, “cancer”, “nurse”, and “physician” are other terms that were similar in frequency of appearance between CNC 1980–2016 articles (column 9) and CJOT, OTN and JOS articles to name a few. Some terms such as “rehabilitation”, “risk”, and “mental health” were used more frequently in CJOT articles than in CNC articles. Table S2 also shows that many terms, such as “stroke”, “health care” and “impairment” increased over the three timeframes of the CJOT (columns 2–4).

Table S3 lists n = 33 terms indicating clients identified in the CJOT, OTN and JOS articles. In the CNC 1980–2016 articles (column 9), some terms are used to a similar degree than in CJOT, OTN and JOS articles such as “patient”, “soldier” and “veteran”. Most terms were used less frequently in the CNC 1980–2016 articles (column 9) than in CJOT, OTN and JOS articles; for example, “client” was used 84% in CJOT, 83% in OTN and 27% in JOS (years 2009–2016), but only 14% in CNC 1980–2016 articles (column 9).

Table S4 lists n = 59 terms and phrases indicating social issues faced by clients of occupational therapy or the field of occupational therapy. Of these, n = 43 are mentioned 0% or less than 1% in the
CNC 1980–2016 articles (column 9) and only $n = 2$ were mentioned above 10% in the CNC 1980–2016 articles (column 9) namely “social”, 28.8% and “indep*”, 13.3%. Many of the terms mentioned less than 1% in the CNC 1980–2016 articles (column 9) are mentioned in over 50% of the articles of the CJOT, OTN and JOS, (years 2009–2016). As to the three different timeframes of the CJOT (column 2–4), Table S4 shows that many words increased over time such as “risk” or “aging”.

The percentage for a given keyword did not vary greatly between the CNC coverage of different timeframes (1980–2016, 2009–2016, 2014–2016). Percentages for some terms were quite different in the PGM before and since 1980—although most terms were similar in their percentage.

3.2. Portrayal of Occupational Therapists and Occupational Therapy (Content Coding Approach)

Although frequencies of keywords give some insight into content, they do not tell the full story. In this section, we provide data obtained from reading relevant sections of downloaded newspaper articles.

3.2.1. Occupational Therapy from 2014 to 2016 in the CNC

Having read the 437 articles (see Table 1, Inclusion Criteria 1), we found two predominant ways that occupational therapy has been covered. One was a narrative that linked occupational therapy to medical terms, a finding in sync with the frequency count (Table S1, column 9). To give two quotes: “It puts our patients at the centre of their care” [55]; and “Mental Health Industries is a commercial out-growth of the occupational therapy work of the Brandon Hospital for Mental Diseases” [56].

Another predominant way of covering occupational therapy was to mention it as part of a list of other medical/health care professions without going into detail about occupational therapy; for example, “in a highway accident when she was 19, Cuddy was thrown from a jeep. When she woke in hospital, she learned she’d sustained a traumatic brain injury. She required occupational therapy, physical therapy, speech therapy and cognitive therapy” [57]. One article stated that occupational therapists are “key members of multidisciplinary health teams as they provide people with the skills for living” [58].

We identified the following other themes.

Scope of Occupational Therapy

Three articles had content pertaining to the scope of occupational therapy. One 2015 letter to the editor by Giovanna Boniface, Managing Director of the Canadian Association of Occupational Therapists, outlined a differentiated scope of occupational therapy that included medical and non-medical concepts. In one letter to the editor she stated:

“OTs work with many populations, including seniors, to increase and improve their participation in daily activities, OTs help older adults maintain independence and reduce their risk of injury and illness so they are able to live at home longer and require less support from the health care system” [59].

In a second letter to the editor, also 2015, Kerry Luck President of the New Brunswick N.B. Association of Occupational Therapists stated:

“Occupational therapy is an essential health service dedicated to helping people achieve independence, meaning and satisfaction in all aspects of their lives. Whether it is in the home, hospital, community, school or private practice, occupational therapists are available to help. The use of the term “occupation” refers to everything that people do during the course of everyday life, or all the activities that occupy one’s time. The profession itself is built on the belief of strength and ability, and uses everyday activities (or occupations) as the foundation for supporting health and well-being through actions related to self-care, productivity and leisure. If you think occupational therapy will work for you, ask for it. Ask your primary health care provider for a referral; ask your health benefits provider if
occupational therapy is covered; ask your local health region, community care centres, or your Minister of Health how you can receive occupational therapy” [60].

In a third article it was stated: “Occupational therapy is a client-centered practice that places a premium on the progress towards the client’s goals” [61].

Occupational Therapy and Research

A second theme found was the mentioning of research projects of occupational therapy scholars such as the development of an in-car recording system to capture driving patterns and behaviour to help seniors drive safely [62]; the effect of participation in a stroke recovery program on community reintegration and life satisfaction for stroke survivors and caregivers [63]; a study on caregiver well-being and support [64]; a study on brothers and sisters caring for a parent with dementia [65]; the relationship between disability and the social, economic, and political environment [66]; a study to assist older-adult wheelchair users to increase their community participation during the winter [67]; care requirements of seniors [68]; effect of splinting and education sessions with an occupational therapist [69]; benefits of knitting [70]; and studies on emerging technologies such as fall technology [71], anti-collision wheelchairs [71], and robots [72].

Some Aspect of Occupational Therapy

Some articles highlighted specific aspects of occupational therapy and occupational therapists without engaging with an in-depth write-up of the scope of the field and its practitioners. One article highlighted the benefit of the flexibility of At Play Occupational Therapy which is seen to provide avenues to be creative with one’s therapy and to change therapy approaches [73]. One article covering early intervention services featured community-based occupational therapy [74]. An arts-based occupational therapy program in Toronto was featured highlighting the utility of music therapy [75]. Two articles mentioned that occupational therapists use and assess adaptive equipment [76,77] and one article featured a specific app, Handwriting Without Tears [78]. Occupational therapists were described as improving the daily activities of their clients [79] and as looking at physical accessibility in the local community [80].

Voice of Occupational Therapy Practitioners

Six articles quoted occupational therapy practitioners and what they do [61,81–85]. For example, according to the practitioner Ebbesen Rowan, occupational therapy is “client centered. It’s what works for the individual, their life, their role, and their style” [84]. One article stated that occupational therapy “is the use of treatments to develop, recover, or maintain the daily living and work skills of people with a physical, mental or developmental condition” [61] and that “[o]ccupational therapy is a client-centered practice that places a premium on the progress towards the client’s goals” [61] before it quoted the practitioner Suzanne Turnbull stating “the work part of occupational therapy for kids is being able to play more freely without limitations of physical or mental challenges, as well as learning to understand and change how a child’s body reacts in certain social situations” [61]. Another article quoted the practitioner Penny Doncaster: “Occupational Therapy helps people to do the everyday things that they want to do, and need to do, when faced with illness, injury, disability or challenging life events. Occupational therapists have a broad education in the health, social, psychological and occupational sciences which equip them with the attitudes, skills, and knowledge to work collaboratively with people, individually or in groups, to bring about positive life changes” [85].

School-Based Occupational Therapy

One article highlighted how school-based occupational therapy was changing by featuring the “service delivery model, called Partnering for Change (P4C)” [86]. The article highlighted that occupational therapists (OTs) collaborated with educators in context, which meant “that they work[ed]
in all the spaces and places in a school where children learn and play.” The article stated that “switching from direct one-on-one care to a classroom-based service model required a philosophical shift in the way OTs delivered occupational therapy services” [86].

Need for More Occupational Therapists

Another theme was the need for more occupational therapists; for example: “there is inadequate access to occupational therapy services in home care and residential care in our province. We agree with Senior’s Advocate Isobel Mackenzie that seniors should be able to bathe when they need and want to. Ensuring that seniors who receive home care or live in residential care have access to occupational therapy is a critical step to meeting that goal” [87]. One article [58] questioned that Saskatchewan does not have its own occupational therapy training program as many more occupational therapists are needed in Saskatchewan.

Educating the Public

One theme was the importance of educating the public about occupational therapy. One article covered the Gibbons School sixth annual career day [88] and four articles focused on other issues to educate the public on various topics [80,89–91].

3.2.2. Occupational Therapy in the Globe and Mail: Before 1980

Of the articles downloaded from the PGM database that contained “occupational therapy” and any of the words (“scope”, “motivation”, “objective”, “aim”, “purpose”), n = 6 articles described occupational therapy:

“It should not be forgotten that occupational therapy is really a mode of education . . . where hand work is introduced for not vocational but cultural purposes” [92].

“The aims of the Ontario Society of Occupational Therapy is to provide suitable occupation for sick folk who are suffering from long and tedious illnesses” [93].

“The ‘pupils’ big and little, attending occupational therapy classes are neurologic, diabetic, or cardiac cases, patients suffering from partial paralysis or in the recuperative stages of ‘sleeping sickness’ for whom occupational therapy is found particularly beneficial” [94].

“While, as I have said, the object of this work is whole therapeutic and the development of right movement and a right mental attitude is the primary purpose, the secondary one of providing an enthralling hobby for handicapped folk, and even a means of earning a livelihood is by no means a matter of small consequence” [95].

“Occupational therapy is not teaching a patient a new trade. It is guiding a patient to the confident recovery and proper co-ordination of muscles, nerves, and limbs, plus the building of mental confidence. The latter so important to physical recovery” [96].

“Occupational therapy, a stepping stone between the hospital and everyday community life . . . is the art of teaching people how to utilize their muscles and minds” [97].

3.2.3. Occupational Therapy in the CNC: 1980–2016

Of the n = 506 articles downloaded from the CNC database from 1980 to 2016 that contained the term, “occupational therapy” and any of the words (“scope”, “motivation”, “objective”, “aim”, “purpose”) most of the articles did not provide any content about occupational therapy. For the ones that did, the main theme was that occupational therapists felt they were misunderstood. Other articles mentioned various aspects of occupational therapy and two quoted practitioners.

Public Does Not Understand Them

A theme that was found in more than one article was that occupational therapists felt that the public did not understand their role. A 1986 article stressed that “Occupational therapists are not to be
confused with physiotherapists who work with physically disabled people”, as the aim of occupational therapy is “to develop self-reliance, teach them the skills and modify their environment so they can live as independently as possible” [98]. One article highlighted how “Occupational therapists, called OTs in the trade, used to be thought of as teachers of weaving to invalids suffering from boredom and despair. These days they are all-purpose professionals, and sophisticated use of computers is only part of the package” [99]. Four articles stated that occupational therapy is misunderstood [100–103].

In a 1985 article covering a national occupational therapy event in Kingston, Ontario, it was noted that what occupational therapists do is not well understood; that the perception was still based on past realities (“I had always thought that occupational therapists were the ladies who taught patients how to weave and knit, but, apparently, I’m way out of date. I’m not the only one, however—hence the O.T.s’ determination to start tooting their own horn”) [100]. A 2006 article stated: “Anne-Marie Dreher said, explaining she wants to dispel the myth that OTs simply teach basket weaving and knitting, ‘I don’t even know how to basket weave’” [101]. Lucie, an occupational therapist, stated in a 2013 article: “the greatest misconception about occupational therapy is not realizing the broad scope of areas encompassed in this highly respected medical profession” [102]. A 1998 article stated: “Many people have only a superficial knowledge regarding the scope of occupational therapy—which has led to erroneous assumptions about the place of occupational therapy in rehabilitation” [103].

Aspects of Occupational Therapy

Occupational therapy was described as evidence-based therapies by the Autism Science Foundation [104]. Occupational therapists were seen to meet the needs of an aging population by helping them age in place, stay healthy, and lead full lives. By looking at a person holistically, occupational therapists can adapt an environment so that it allows the client to function at his or her highest level of independence [105]. Independence is also a theme in [102,106,107]. A 2013 article stated that one role of OT is “to help wounded recruits re-learn new ways to cope with everyday tasks” [108]. According to one article: “OTs primary goal is to help people participate in the occupations that give meaning and purpose in their lives”, that occupational therapists “work with the client so that they can return to their daily occupation” whereby occupation is described as being more than just work. Places of work listed are “acute-care, long-term care and rehabilitation facilities, and in the community” [101]. The same article flagged an event on barrier-free flex housing organized in their role as advocates by the Saskatchewan Society of Occupational Therapists in conjunction with the CAOT, CMHC and the Canadian Paraplegic Association [101].

Voice of Occupational Therapy Practitioners

According to the practitioner Carol Bowlby Sifton who runs an Eldercare Occupational Therapy: “Occupation really means doing” [109]. Sifton described her role as follows: “As occupational therapists, we are here to enable these people and their caregivers to continue to be doing”, and “to be involved in life, to maintain a familiar lifestyle” [109]. According to Sifton, an “occupational therapist works with Alzheimer’s sufferers and caregivers to help cue memory, to see that myriad activities are done safely and to maintain social life; simply, to retain constructive engagement with life” [109]. Another article quoted two occupational therapy practitioners who emphasized that they “have a duty to being advocates for persons with disabilities, and promoting communities that are inclusive and encourage participation from all people regardless of age or ability” [101].

3.3. Portrayal of Occupational Science (Content Coding Approach)

The CNC mentioned “Occupational Science” in n = 26 articles: 1990 (n = 2), 1999 (n = 5), 2004 (n = 1), 2006 (n = 3), 2007 (n = 1), 2008 (n = 7), 2010 (n = 2) and 2010–2015 (n = 1 each year). The Globe and Mail mentioned “Occupational Science” in n = 5 articles: n = 1 each in 2006, 2007, 2008, 2012 and 2013. All coverage was of the “news” type. None of the n = 26 articles stated what occupational science is or what it entails. As to how occupational science was mentioned, six articles referred to occupational
science as part of an affiliation of a person [63,64,110–113], whereby the person was often mentioned in relation to a research project that they are associated with: “Dr. Melinda Suto, an associate professor with UBC’s Department of Occupational Science and Occupational Therapy, is the principal investigator. She is researching the benefits of community gardening on those living with severe mental illness in supportive housing” [110]. Other topics of study mentioned were health and well-being of people recovering from stroke [63,64], “interrelationship between disability and the social, economic and political environment” [66], “the effects of hockey-related concussions in male and female youth players” [114], and losing interest in life [115].

Two articles mentioned occupational science as part of an event announcement: “‘Fit Not Frail: Activities to Promote Health at any Age or Ability’ takes place 3 October at 7:15 p.m. It’s hosted by the UBC Department of Occupational Science and Occupational Therapy” [116] and “This is the last in a five-part series running this week profiling five local innovators you have likely never heard of. Monday Occupational science researcher Alex Mihailidis” [117]. Alex Mihailidis was also mentioned in two other articles covering fall technology [71] and robotic research [72].

One article mentioned data that was published in the Journal of Occupational Science, April 2003 [118]; and one article mentioned that Stephen Hawking spoke at an occupational science conference at the University of Southern California [119].

4. Discussion

Our findings suggest that the Canadian newspapers we covered left readers with an inaccurate view of what occupational therapy is all about.

The use of medical language in conjunction with occupational therapy in the Canadian newspapers covered was also evident in the academic journal (CJOT) and the practitioner magazine (OTN) and, to a lesser extent, in the JOS. However, the newspaper articles we covered rarely engaged with the social issues occupational therapy clients face and did not engage conceptually with the meaning of “occupation” although these two areas were covered extensively in the CJOT, OTN and JOS articles over the last 30 years reflecting that the occupational therapy field in Canada has shifted to a “social view of occupation as a determinant and means of health, wellness and justice” [120], and that social issues are an integral part to the work of occupational therapists because they influence the lives of clients and is the root of many of the problems that act as barriers to employment, health, sociocultural interaction, and other determinants of well-being [121,122]. The social groups identified as “typical” occupational therapy clients were also misrepresented in the newspapers by lack of scope. Occupational therapy works with people “who are restricted in their participation or who are socially excluded owing to their membership of social or cultural minority groups” [123]; however, occupational therapy clients such as “immigrant” and “aboriginal people” were not covered in the newspaper articles.

Our findings are not surprising. Newspapers are influenced by their environment including ownership, funding, need for circulation, advertisement revenue and the readers’ preference for reading like-minded news [39,44,124–143]. Ownership, funding, need for circulation and advertisement revenue may be the factors that keep the focus on the medical angles of occupational therapy versus issues such as occupational justice and occupational rights. Tommaso and Wilding posit that the dominance of a biomedical discourse in health care settings may adversely affect articulation of profession-specific values [144]. This could have been another factor that led to the results we found. The trend of reading like-minded news [143,145,146] might account for the lack of coverage of marginalized social groups such as immigrants and disabled people in a non-medical narrative, or indigenous people as clients of occupational therapy. Our findings of the lack of coverage of social issues and lack of coverage of marginalized groups are not exclusive to the topic of occupational therapy. Social issues are often underreported [147], as are marginalized populations such as disabled people [148].
Although our findings are not surprising, we posit that the inaccuracy of coverage we found might have consequences. It could influence who is interested in pursuing occupational therapy as a career and might be a contributing factor to the problem thematized in academic journals [4–9] and some Canadian newspaper articles [98–103] that Canadians are confused about occupational therapy.

As to the field of occupational science, no newspaper article covered occupational science with contextual content and as such the reader was not made aware of the existence of occupational science as a field.

4.1. What to Do

4.1.1. Occupational Therapy

If the Canadian newspapers are failing to inform the public, it is up to the field to be an active educator that pushes its story out to the media. We found evidence for occupational therapy self-promotion to newspapers in the form of Giovanna Boniface, Managing Director of Canadian Association of Occupational Therapists (CAOT) and Kelly Luck President of the New Brunswick N.B. Association of Occupational Therapists writing letters to the editor [59,60] and various newspaper articles quoting occupational therapy practitioners [81–85,109]. However, the numbers of occupational therapists adding content to the newspaper stories are small, possibly because of some of the aforementioned factors.

The occupational therapy field has no control over what newspapers pick up as storylines; however, the field has control over its own message. Public awareness campaigns using various means have been and still are seen as needed in Canada [10,11]. The CAOT outlines on the Advocacy section of their webpage the national ad campaign “Occupational therapy works . . . Ask for it!” CAOT’s national ad campaign launched in October 2015 deemed it occupational therapy month [149]. The campaign included messages on billboards in major cities across Canada; members were sent posters and bumper stickers with the message: “Occupational therapy works . . . Ask for it!”

Given the voiced sentiment in academic articles [4–9] and the newspaper articles covered [98–103] that occupational therapists feel they are not understood by the public, the question arises as to the messaging in the Canadian occupational therapy campaigns. Does the messaging, for example, in recent years reflect the scope and breadth of the field of occupational therapy in Canada? Do the campaigns under way since 2014 reflect the breadth and scope of the two documents [32,33] highlighted as important on the CAOT webpage [34] to help occupational therapists define their practice?

One potential future research project could look at the messaging that was and is intrinsic to Canadian occupational therapy public awareness campaigns.

Indeed, literature suggests that the issue of branding is not that simple [150]. Townsend stated that “foundational features of occupational therapy are consistent with foundational features of social justice. However, analysis also shows that occupational therapy’s social vision is narrowed to comply with dominant community, managerial and medical approaches to disability and aging” [151]. It is seen that “[o]ne of the problems that occupational therapists have in communicating their core concepts is that the word occupation appears to have a specialist meaning for the profession that is not shared by the general public” [152]. Creek outlined an attempt to generate a concise definition of occupational therapy reflecting the breadth of OT [152] and suggests that “[i]t may be that different definitions of occupational therapy, incorporating different categories of elements in each one, would be appropriate for use in different situations” [152]. One study reported on how a set of consumers would define occupational therapy [153].

Another study looked at the “effectiveness of teaching final year students strategies that were designed to improve their descriptions of occupational therapy” [144]. Four strategies were proposed:

“(1) Our domain is in our name: As the word ‘occupation’ appears in the name ‘occupational therapist’, occupational therapists ought to be explicit about the connection between the profession’s title and their skills. Use of occupation enables therapists to
identify themselves as ‘experts in occupation’; (2) Focus on theory: Words from theories of human occupation can act as a starting point for a definition of occupational therapy; (3) Avoiding biomedical language and frameworks: Unconscious conformity with biomedicine may perpetuate lack of understanding of occupational therapy. Using words such as “function” and “activities of daily living” instead of “occupation” may dilute or distort the focus of occupational therapy; (4) Using visualization: An informal strategy that involved thinking about a favourite occupation and connecting with the feelings that arise when doing this favoured occupation and then thinking about how one would feel if he/she could no longer participate in this occupation. A person is asked to compare and contrast his/her feelings in these two scenarios to highlight how occupation can vitally impact upon satisfaction, enjoyment in life, and well-being” [144].

While the field of occupational therapy is engaged in various endeavors to promote itself, there is a lack of metrics to measure the type of message transmitted. To develop and to use metrics might be a worthwhile endeavor to pursue.

4.1.2. Occupational Science

For occupational science, there is also a need to diversify its profile beyond what the newspapers covered. As for Canada, one avenue could be to profile occupational science as part of the occupational therapy campaigns in Canada. Currently, the occupational therapy webpages that suggest ways of raising awareness of occupational therapy (such as the CAOT’s National Ad Campaign [149]) are not covering ways of raising awareness of occupational science, even though the CAOT webpage contains information about occupational science. Occupational science is described to some degree on webpages of some faculties that cover occupational science and occupational therapy such as the Faculty of Medicine Occupational Science and Occupational Therapy at the University of British Columbia [154]. However, in other cases such as the webpage of the Department of Occupational Science and Occupational Therapy at the University of Toronto, there is little content directly linked to occupational science, with only one sentence stating “The goal of occupational science is to uncover and fully understand human occupation and its enablement” [155]. In other cases such as the webpage of the Western University School of Occupational Therapy, which has a research-based programs in occupational science, it is not clear to the visitor of the webpage that the Western University School of Occupational Therapy actually has a research-based program in occupational science. The webpage reveals this fact only after one clicks on the link called “research based programs” [156]. However there is no indication that one would find content on occupational science by clicking on this link. Another way to find out about Western University’s occupational science program is to go through the School of Health and Rehabilitation Science [157].

The Canadian Society of Occupational Scientists (CSOS) launched its website in April 2003 [36]. Part of the organization’s mission states: “As an interdisciplinary organization, the CSOS is dedicated to supporting the generation and application of knowledge regarding occupation, seeing this is vital to the promotion of health, well-being, and justice.” What remains unclear from the website is that occupational science is a degree program of its own and, while the website asks “Who are Occupational Scientists?”, it does not provide further information on how someone who may be interested in this field can pursue a career as an occupational scientist and what the career could be—academic, non-academic, or both. Unfortunately, the gap in information and promotion of the field does not help with raising awareness of the field and the importance of its role.

4.2. Limitations

The descriptive quantitative data obtained from the Canadian Newsstand Complete database does not cover all newspapers in Canada but covers nearly 300 newspapers whose selection is biased according to the rules of the database. The findings are not meant to be generalized toward other media or other newspapers; however, a pattern of neglect in some areas pertaining to occupational
therapy and occupational science is still apparent in the sources that are covered in this paper, and the authors posit that this can be used to guide future media analyses. The qualitative data was not obtained from all the articles that cover occupational therapy in the newspapers but were limited in some cases by years used and in other cases by additional search terms besides “occupational therapy”.

5. Conclusions

Occupational therapy works to address the problems of its clients by looking at every aspect of their lives, which changes both clients and the environment around them [158]. Occupational science assists in developing the understanding of the occupational nature of humans [14,36]. The newspapers covered in our study do not transmit knowledge about occupational therapy and occupational science that reflects their many facets. The newspapers failed to link together occupation and the social aspect within its occupational therapy and occupational science coverage. Some vision and mission statements of Canadian occupational therapy academic degrees [155,159–161] have clear language around the social and occupation aspects. However, readers of the newspapers we covered that are interested in the social side of occupation are not enticed to visit occupational therapy academic degree webpages as its sociality is rarely linked to occupational therapy in the newspapers covered. However, newspapers are only one source of information. Public awareness campaigns have been used for years by occupational therapists in Canada. Given that occupational therapists in Canada still voice that they are misunderstood, it might be a worthwhile project to investigate the messaging evident in these campaigns.

As for occupational science, the situation is worse due to a lack of substantial information on occupational science, not only in newspapers but also in other places. If occupational science is useful to occupational therapy as an academic field and to occupational therapy practice, one path that should be pushed is the increased visibility and content around occupational science in occupational therapy campaigns and occupational therapy degree webpages.

Supplementary Materials: The following are available online at www.mdpi.com/2075-4698/6/2/18/s1, Table S1: Occupational Concepts Mentioned, Table S2: Medical Terms Mentioned, Table S3: Clients of OT Mentioned, Table S4: Social Concepts and Issues Linked to the Experience of OT Clients and the OT Field.

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