ARTIGO ORIGINAL | ORIGINAL ARTICLE
Addressing Incontinence: A Call for Enhanced Awareness and Treatment Among Healthcare Professionals

Impact Of Incontinence On Healthcare Professionals: Highlighting The Imperative For Increased Awareness

Impacto da Incontinência nos Profissionais de Saúde: Destacando a Necessidade de Uma Maior Sensibilização

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Abstract

Background: *Urinary and anal incontinence are common conditions, although often underreported, due to the social stigma attached. This study aims to identify the prevalence and impact of urinary and/or anal incontinence among Portuguese health care providers (PHCP) and to realize if the stigma existing in the general population is also common among this group of professionals.*

Methods: *A cross-sectional study. Data was obtained from an online questionnaire aimed to characterize incontinence among PHCP working in a Public Hospital. The survey included questions regarding demographic data, incontinence characteristics and its impact on quality of life (QoL), the treatment and respective effect, and the search for medical care.*

Results: *We included 133 PHCP, mean age of 39 years; 46 (34.59%) reported urinary incontinence, especially stress incontinence, and 7 (5.26%) reported gas incontinence, 5 of whom had anal and urinary incontinence.*

Only 17 of 48 PHCP (35.42%) with incontinence symptoms had undergone medical treatment, which resulted in an average improvement of 3.11 in QoL, (4.22 pre-treatment versus 7.33 post-treatment, p<0.001), on a Visual Analogue Scale (where 0 is the worst and 10 is the best QoL). Among those experiencing symptoms but refraining from seeking medical assistance, the primary reason cited was embarrassment (67.7%).

Conclusion: *Despite a considerable number of incontinence cases, many PHCP do not search for medical care, even though this pathology interferes with their QoL. Nevertheless, most of those who present incontinence symptoms consider medical evaluation important. The authors suggest strategies to raise awareness of the importance of this issue among this group of professionals, including, training sessions/lectures.*

Key Words: *Urinary Incontinence, Fecal Incontinence, Health Personnel, Therapeutics.*

Resumo

Introdução: A incontinência urinária e anal são comuns, embora muitas vezes sub-diagnosticadas, devido ao estigma social associado. Este estudo tem como objetivo identificar a prevalência e o impacto da incontinência urinária e/ou anal nos Profissionais de Saúde Portugueses (PSP) e perceber se o estigma existente na população em geral é também comum neste grupo de profissionais.

Métodos: Estudo transversal. Os dados foram obtidos através de um questionário online com o objetivo de caraterizar a incontinência entre os PSP que trabalham num Hospital Público. O inquérito incluiu questões sobre dados demográficos, características da incontinência e o seu impacto na qualidade de vida (QdV), bem como, sobre o tratamento e respetivo efeito, e a procura de cuidados médicos.

Resultados: Foram incluídos 133 PSP, com idade média de 39 anos; 46 (34,59%) referiram incontinência urinária, especialmente de esforço, e 7 (5,26%) referiram

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Declaração de Contribuição/ Contributorship Statement: Conceptualization: LVP, IT, JL, CAB. Metodology: SA, LVP, FG. Analisys: LVP, SA. Original draft: LVP. Review & editing: IT, JL,CAB.

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Recebido/Received: *3/2024.* ***Aceite/Accepted:*** *8/2025.* ***Publicado online/Published online:*** *09/2025.* ***Publicado / Published:*** *09/2025.*

incontinência para gases, sendo que 5 destes tinham incontinência anal e urinária.

Apenas 17 dos 48 PSP (35,42%) com sintomas de incontinência foram submetidos a tratamento médico, o que resultou numa melhoria média de 3,11 na QdV, (4,22 antes do tratamento versus 7,33 após o tratamento, p<0,001), na Escala Visual Analógica, em que 0 é a pior e 10 é a melhor QdV. Entre os que apresentavam sintomas, mas não procuraram assistência médica, o principal motivo citado foi a vergonha (67,7%).

Conclusão: Apesar de um número considerável de casos de incontinência, muitos PSP não procuram ajuda médica, mesmo considerando que interfere na qualidade de vida. No entanto, a maioria das pessoas que apresentam sintomas de incontinência considera importante a avaliação médica. Sugere-se estratégias para sensibilizar este grupo de profissionais, nomeadamente, através de sessões de formação ou palestras.

Palavras-chaves: Incontinência Urinária, Incontinência Fecal, Profissionais de saúde, Terapêutica.

Introduction

Incontinence is a common condition characterized by urinary or fecal/gas leakage. However, it is often underreported due to its embarrassing nature, the social stigma attached, the normalization and trivialization of incontinence by the general population, and the lack of direct questioning about it by physicians.[1, 2] The reported prevalence of urinary incontinence (UI) varies between 5% and 69% in women and 11% and 34% in men and increases with age.[1] However, the 7.7% prevalence of anal incontinence described in the literature is assumed to be underestimated.[3, 4, 5]

According to the International Continence Society, the 3 most common types of UI are: urge UI, stress UI and mixed UI. Stress UI is defined as the involuntary loss of urine, triggered by straining (e.g. coughing, jumping, waltzing); urge UI is an involuntary leakage of urine associated with a strong urge to urinate and mixed UI is defined as the involuntary leakage associated with both, urgency and stress incontinence.[1, 6]

Risk factors for UI are parity, age, obesity, pelvic surgery, smoking, female gender, caucasian race, diabetes mellitus, radical prostatectomy or a transurethral resection of the prostate.[7-9] Vaginal deliveries are associated with an increased risk of UI, particularly in cases of dystocic deliveries.[8,10] Cesarean section appears to reduce postpartum UI, but its protective effect diminishes over time and disappears after multiple deliveries. Specific risk factors for stress UI are lung disease and intense physical activity.[11,12]

On the other hand, anal incontinence is defined as the involuntary loss of rectal contents (feces, gas) through the anal canal and the inability to postpone an evacuation until socially convenient.[13] Risk factors for it are age, female gender, obesity, smoking, weakness and/or trauma of pelvic floor muscle (PFM), diarrhea, evacuation disorder, anal surgery and the coexistence of urinary incontinence and pelvic organ prolapse.[4,14]

The main aim of this study is to identify the prevalence and impact of urinary and/or anal incontinence among Portuguese health care providers (PHCP) and to realize if the stigma existing in the general population is also common among this group of professionals. Secondarily, by exploring the attitudes and practices of PHCP towards incontinence, we can better understand the existing gaps and potential strategies to improve care for this prevalent yet often neglected condition.

To the best of our knowledge, no study has evaluated anal and urinary incontinence in PHCP.

Methods

This cross-sectional study used an anonymous survey, allowing participants to take part voluntarily and confidentially.

We enrolled all PHCPs working at our Public Hospital Center who have access to a professional email, including nurses, doctors, therapists, assistants, etc. The incontinence data were obtained from an anonymous online questionnaire made by the authors. The survey was sent by email to all PHCP of our hospital via professional e-mail. PHCP who agreed and wanted to participate have filled the survey. The exclusion criteria were incorrect filling of the questionnaire. The survey included questions regarding demographic data, anal and urinary incontinence characteristics (urge, stress, and mixed incontinence/ stool, gas or mixed, respectively) and its impact on quality of life (quantifying on a visual analogue scale (VAS) of 0 to 10- where 0 is the worst and 10 is the best quality of life), the search for medical care and for physiatry appointment, the type of treatment (pharmacological treatment, home exercises, PFM re-education treatment/ physiotherapy , surgery, other)and its effects, and the need for a medical appointment in case of maintaining incontinence symptoms. The questionnaire can be found in the appendices.

Since the study was carried out by means of a questionnaire, no physical examination/appointment was carried out. Furthermore, we chose not to use validated scales on quality of life because we would get less adherence to an online questionnaire.

Data was collected from May to June of 2023.

We performed a descriptive analysis of the incontinence's characteristics and its treatment, considering absolute and relative frequencies for categorical variables, mean and standard deviation for normally distributed continuous variables, and median and range for non-normally distributed continuous variables. The normality of continuous variables was assessed using the Kolmogorov–Smirnov test. Pre-treatment and post-treatment QoL on a VAS were compared with the Paired Samples T-Test. All statistical analyses were performed using IBM® SPSS® Statistics version 27; statistical significance was set at $p < 0.05$.

Results

This study included 133 PHCP, 26 were excluded; 102 female (76.69 %), and 31 males (23.31%); mean age of 39 years (table 1).

Table 1 - Sample characteristics.

Sample Characteristics	(n)	%
Gender		
Female	102	76.69
Male	31	23.31
Total	133	100
Mean age		
	39	-

Table 2 - *Characteristics of incontinence type.*

Anal or Urinary Incontinence	Female	Male	Total	
	(n)	(n)	(n)	%
Yes	45	3	48	36.1
No	57	28	85	63.9
Type of Incontinence	**Female**	**Male**	**Total**	
	(n)	(n)	(n)	%
Urinary Incontinence				
Stress UI	22	3	25	54.3
Mixed UI (stress incontinence + urge incontinence)	13	-	13	28.3
Urge UI	8	-	8	17.4
Anal Incontinence				
Gas incontinence	7	-	7	100
Urinary Incontinence and Anal Incontinence				
Gas incontinence and Mixed UI	3	-	3	60
Gas incontinence and Stress UI	2	-	2	40

Within our population, 46 PHCP (34.59%) reported urinary incontinence, especially stress incontinence; seven (5.26 %) reported gas incontinence; five (3.76 %) presented both anal and urinary incontinence. Regarding QoL on VAS, patients without treatment or before treatment scored an average of 5.13.

Only 15 of 48 PHCP (31.25%) with incontinence consulted a physiatrist because of incontinence, and 17 of 48 PHCP (35.42%) had undergone treatment (conservative and/or surgical treatment, characterized in table 3) which resulted in a significant average improvement of 3.11 in QoL on VAS (4.22 mean pre-treatment versus 7.33 mean post-treatment, $p<0.001$).

Table 4 illustrates the reasons why PHCP, despite experiencing symptoms of incontinence, refrained from seeking medical assistance.

Of those who maintain incontinence symptoms, 85.1% (40 of 47 PHCP- one of them became asymptomatic) considered important to be assessed in a medical appointment.

Discussion

In this study, we evaluated and characterized the prevalence of urinary and/or anal incontinence in a sample of PHCP and the need for awareness-raising strategies.

Indeed, incontinence is under-treated, even in PHCP. Despite the considerable prevalence of urinary and anal incontinence found in our study, around 36% of our sample, medical demand for this condition remains low, even with PHCP answering that this pathology reduces their QoL.

Table 3 - Treatment carried out by Portuguese health care providers.

Type of treatment						
Home exercises	Behaviour modification	Surgical treatment	Pelvic floor re-education/ physiotherapy	Medication	(n)	%
✔	✔				6	35.3
	✔	✔	✔		2	11.8
	✔		✔	✔	2	11.8
	✔		✔	✔	3	17.6
✔	✔		✔	✔	3	17.6
✔	✔	✔		✔	1	5.9

Table 4 - Reasons why Portuguese health care providers did not search for medial help.

Reasons not to seek medical help	(n)	%
Embarrassment about their pathology	21	67.7
Lack of clarity about the most appropriate medical specialty to address their condition/ uncertainty about available treatment options	9	29.0
Incontinence do not significantly disrupt their daily lives	1	3.3

Patients often deny or conceal incontinence, leading to significant physical and psychosocial limitations. Key consequences include loss of self-confidence and social isolation, along with negative outcomes such as anxiety, depression, diminished sexual activity, and reduced participation.[15] In fact, the literature widely recognizes that incontinence has a detrimental effect on the QoL.[16] Failkow et al. conducted a study in which they compared patients with dual incontinence to those with urinary incontinence alone, revealing a significantly greater impairment in the physical functioning scale of the Short Form-12 among patients experiencing both fecal and urinary incontinence.[17]

Recent studies on women with UI highlight a strong link between UI and sexual dysfunction, including dyspareunia, low sexual desire, and issues with arousal and orgasm. Common reasons for avoiding sexual activity include nocturnal wetness, leakage during intercourse, embarrassment, and depression. Women with UI often report decreased libido, vaginal dryness, and pain during intercourse.[18] Studies on the effect of anal incontinence on sexual function are limited, but womans with anal incontinence also showed low sexual desire, satisfaction, arousal, lubrication, and orgasm compared to those without anal incontinence . Major factors affecting sexual function include fear of soiling during intercourse, embarrassment, and dyspareunia.[19]

The physical consequences of incontinence can include perineal dermatitis, eventually resulting in tissue swelling, ulcers, and, rarely, sepsis. The resulting pain can restrict daily activities like sitting, walking, and exercising. Also, in some cases, individuals with incontinence may try to manage it by restricting their food and fluid intake, which can lead to nutritional problems.[16]

Our study found that 67.7% of cases where medical help was not sought could be attributed to the stigma and embarrassment linked to incontinence. Similarly, the literature estimates that about 60% of all cases of UI in women go unreported due to the shame and embarrassment it generates.[20] Furthermore, it has been demonstrated that the sense of shame associated with UI can be even greater than that experienced with depression.[21]

Additionally, a lack of awareness about available treatment options among professionals who do not deal with patients with this pathology, as well as uncertainty about the most appropriate medical specialty to address their condition, also contributes to the absence of medical seeking.

We would like to highlight that the prevalence of incontinence is higher than reported in the literature possibly due to the age of the sample studied or because PHCP who have symptoms of incontinence are more likely to take part in a study about this condition. For those who have sought treatment, treatment options have shown significant improvement in QoL. Conservative management has been recognized as the first-line management for anal incontinence and UI, which includes behavior modification, domiciliary exercises, pharmaceutical intervention and/or PFM reeducation/physiotherapy.[6, 4] In our study, all PHCP who underwent treatment exhibited modifications in their routines, highlighting a unanimous consensus regarding the significance of adopting lifestyle changes for the improvement of both urinary and anal incontinence, such as weight loss, smoking abstinence, appropriate toilet habits (to reduce intra-abdominal pressure) and dietary habits to maintain proper consistency of stool and to abstain from those items in the diet contributing as bladder/intestinal mucosa irritants.[4, 22, 5] Pharmacological treatment is also an option: anticholinergic drugs act directly on the detrusor muscle, increasing compliance and reducing detrusor overactivity, which leads to reductions in urgency urinary incontinence; β3-adrenergic agonists for urgency incontinence may be an option for those who cannot tolerate the adverse effects of anticholinergic drugs.[7] A beta-3 agonist specifically targets the bladder, where 97% of beta-adrenergic receptors are of the beta-3 subtype, leading to the relaxation of bladder smooth muscle.[23] Thus, the recent literature showed that beta-3 agonist has less side effects and better tolerability as compared to antimuscarnics.[24] Anti-diarrheal and stool bulking agents can be used for those with loose stool consistency and should be personalized based on assessment of the patient's response.[5]

Out of the 17 individuals who sought medical assistance, a majority of 15 chose to consult with physiatrists. This preference for physiatry appointments suggests a growing recognition within the healthcare community of the specialty's expertise in addressing incontinence-related issues. The rehabilitation program should be prescribed by a physiatrist and tailored to each person, considering their unique physical examination findings. PFM training is considered a first-line treatment for both anal and UI, and it can be done alone or combined with other treatments.[6] It has been demonstrated that rehabilitation programs effectively improve PFM strength and contraction speed, increase the accuracy of PFM control, decrease urinary and anal incontinence symptoms, and improve quality of life.[25] Surgical options are considered in refractory cases, with physiatrists contributing to preoperative assessment, postoperative rehabilitation, and long-term management.[4]

Limitations

Although this was a cross-sectional study, the questionnaire included some questions about past situations, which may

lead to recall bias during the filling of it. Furthermore, inaccurate data reported by PHCP might have resulted in misclassification of incontinence and its characteristics. Additionally, it is important to note that our sample is small and predominantly female, a group that generally has a higher tendency to seek medical care. It should also be mentioned that individuals with incontinence are more likely to participate in such studies. Also, we were unable to collect data on potential risk factors for incontinence or use validated scales due to the survey-based design.

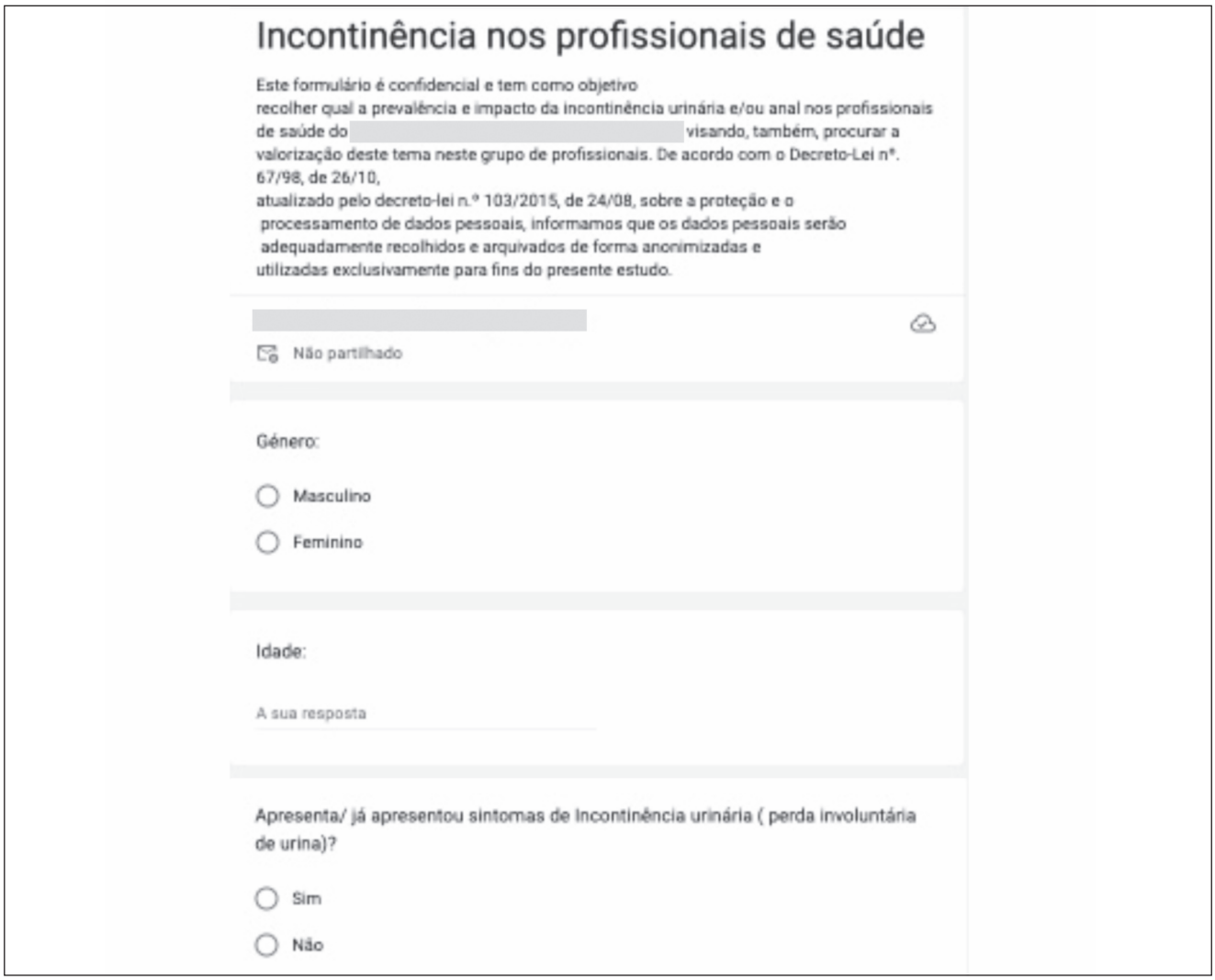
Also, although we included all professional classes working in our hospital, we did not inquire about the specific professional group. This decision was made to prevent potential reluctance in responding to the questionnaire. However, this approach also represents a limitation since not all professional groups have the same level of knowledge about incontinence.

Conclusion

Despite a considerable number of incontinence cases, many PHCP do not search for medical care, even though this pathology interferes with their QoL. Nevertheless, most of those who present incontinence symptoms consider medical evaluation important.

We suggest strategies to provide information about incontinence and its treatment options, and to raise awareness of the importance of this issue among this group of professionals, such as, training sessions /lectures, care, not only on the secondary and tertiary health but also in primary care. Furthermore, this condition should be taught in undergraduate education to increase awareness among the population, and particularly among future PHCP. Thus, it will be easier for PHCP to address, manage, and inform patients and the population about incontinence.

Appendices



Incontinência nos profissionais de saúde

Este formulário é confidencial e tem como objetivo recolher qual a prevalência e impacto da incontinência urinária e/ou anal nos profissionais de saúde do [redacted] visando, também, procurar a valorização deste tema neste grupo de profissionais. De acordo com o Decreto-Lei nº. 67/98, de 26/10, atualizado pelo decreto-lei n.º 103/2015, de 24/08, sobre a proteção e o processamento de dados pessoais, informamos que os dados pessoais serão adequadamente recolhidos e arquivados de forma anonimizadas e utilizadas exclusivamente para fins do presente estudo.

[redacted]

Não partilhado

Género:

- Masculino
- Feminino

Idade:

A sua resposta

Apresenta/ já apresentou sintomas de Incontinência urinária (perda involuntária de urina)?

- Sim
- Não

Se respondeu afirmativamente à questão anterior, responda à seguinte questão:
Apresento/ apresentava incontinência urinária:

- ◯ Após esforços como tosse, espirros, pegar em pesos, saltos
- ◯ Após ou durante uma vontade incontrolavel de urinar
- ◯ Ambas as opções

Apresenta/apresentou sintomas de incontinência anal (perda involuntária de fezes e gases)

- ◯ Sim
- ◯ Não

Se respondeu afirmativamente à questão anterior, responda à seguinte questão:
Apresento/ apresentava incontinência anal para:

- ◯ Fezes
- ◯ Gases
- ◯ Ambas as opções

Numa escala de 0 a 10 (em que 0 é a pior qualidade de vida e 10 a melhor qualidade de vida), quantifique a sua qualidade de vida com incontinência urinária/anal?
(se realizou tratamento para a incontinência, pretende-se que classifique a qualidade de vida antes do tratamento)

0	1	2	3	4	5	6	7	8	9	10
◯	◯	◯	◯	◯	◯	◯	◯	◯	◯	◯

Procurou ajuda médica pela incontinência urinária ou anal?

- ◯ Sim
- ◯ Não

Se respondeu afirmativamente à questão anterior, responda à seguinte pergunta:
Que tipo de tratamento realizou ou está a realizar?
(pode escolher mais que uma opção)

- ◯ Medicação
- ◯ Exercicios domiciliários
- ◯ Tratamentos de reeducação do pavimento pélvico/ fisioterapia

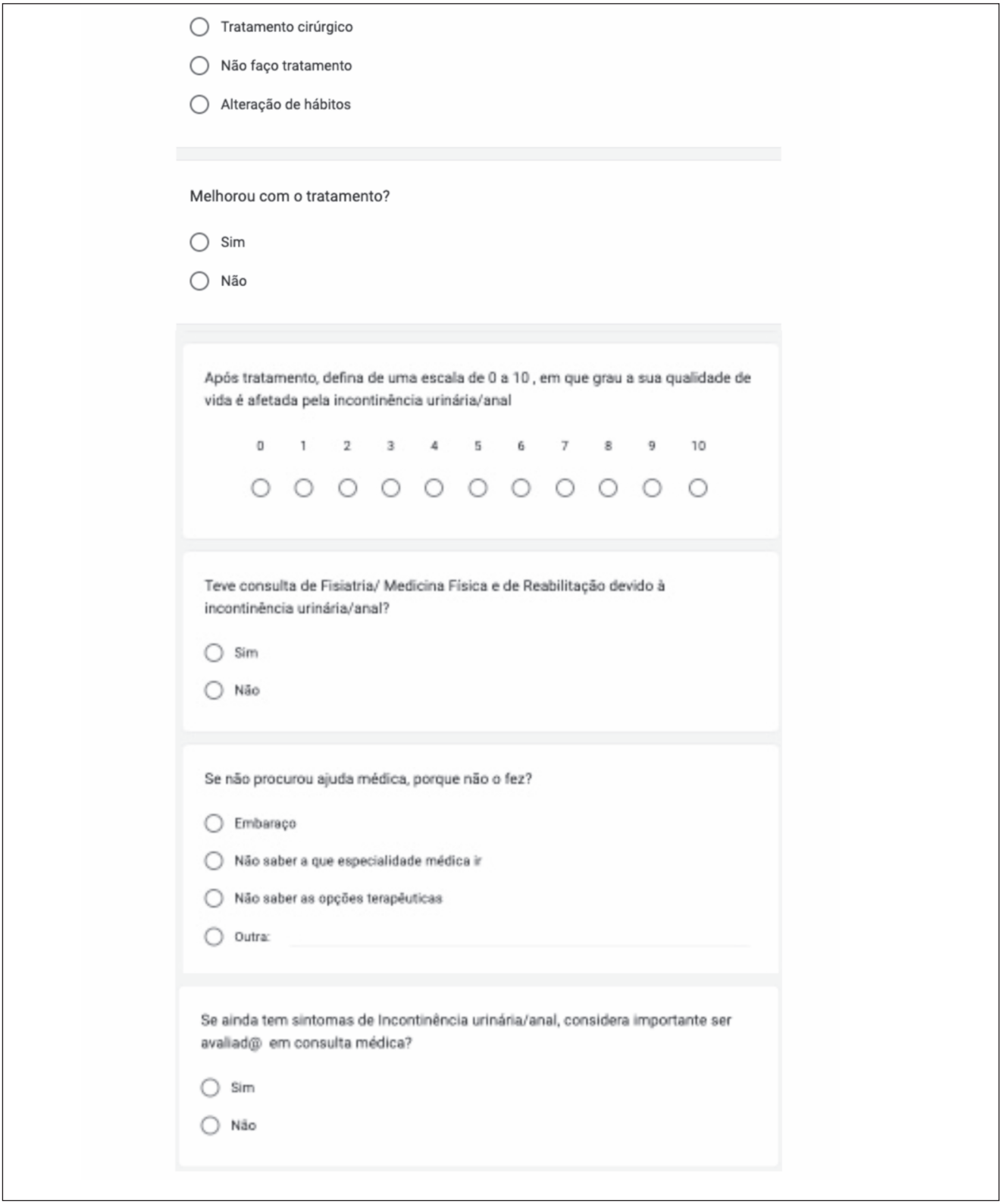


Figure 1 - Questionnaire sent to all health care professionals with a professional email working in a Public Hospital Cente.

Conflitos de Interesse: Os autores declaram a inexistência de conflitos de interesse. Apoio Financeiro: Este trabalho não recebeu qualquer subsídio, bolsa ou financiamento. Proveniência e Revisão por Pares: Não solicitado; revisão externa por pares.

Conflicts of Interest: The authors have no conflicts of interest to declare. Financial Support: This work has not received any contribution grant or scholarship. Provenance and Peer Review: Not commissioned; externally peer-reviewed.

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