



THE PERCEPTION OF RESIDENT PHYSICIANS ON THE SUBJECT OF MENTAL HEALTH IN THE THIRD YEAR OF THE MEDICAL RESIDENCY OF A PUBLIC UNIVERSITY IN LIMA-PERU

PERCEPCIÓN DEL MÉDICO RESIDENTE SOBRE LA ASIGNATURA DE SALUD MENTAL EN EL TERCER AÑO DEL RESIDENTADO MÉDICO DE UNA UNIVERSIDAD PÚBLICA DE LIMA-PERÚ

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ABSTRACT

Introduction: Mental health is an issue that has taken on great importance in recent years and has become a substantial part of many training courses around the world. **Objective:** To determine the perception of resident physicians on a mental health course during the last year of residency. **Methods:** Observational, descriptive, and transversal study with a sample of 130 students from the Mental Health program of the medical residency of Universidad Nacional Federico Villarreal who were surveyed with a form of 10 questions that sought to know the perceptions of the students on this course. The technique used was non-probability sampling. **Results:** Of the 130 respondents, 57.69% were women and 13.85% were pediatricians, 57.69% performed a clinical specialty and 58.46% were free-standing. An exploratory analysis was made: on the importance of the course, differences were found with the age range ($p = 0.038$) and modality of residence ($p = 0.05$). In addition, regarding the acceptance of the course, differences were found with the age range ($p = 0.021$) and type of residency program ($P = 0.053$). **Conclusion:** Participants in the mental health course of the medical residency have good acceptance of this subject and are considered important.

Key words: Mental Health; Internship and residency; Perception; Courses (source: MeSH NLM).

RESUMEN

Introducción: La salud mental es un tema que ha tomado gran importancia en los últimos años y se ha vuelto parte sustancial en muchos programas de formación alrededor del mundo. **Objetivo:** Determinar la percepción del médico residente de la asignatura de salud mental durante el último año del residentado médico. **Métodos:** Estudio observacional, descriptivo y transversal con una muestra de 130 estudiantes del curso de Salud mental de la residencia médica impartida por la Universidad Nacional Federico Villarreal que fueron encuestados con un formulario de 10 preguntas que buscaba conocer las percepciones de los estudiantes sobre este curso. El muestreo fue no probabilístico. **Resultados:** De los 130 encuestados, 57,69% eran mujeres y 13,85% eran pediatras, 57,69% realizaban una especialidad clínica y 58,46% hacia la residencia por modalidad libre. Se hizo un análisis exploratorio: sobre la importancia del curso se encontraron diferencias con el rango de edad ($p = 0,038$) y modalidad de la residencia ($p = 0,05$). Además, con respecto a la aceptación del curso se encontraron diferencias con el rango de edad ($p = 0,021$) y tipo de residencia ($p = 0,053$). **Conclusión:** Los participantes del curso de salud mental del residentado médico tienen buena aceptación de la asignatura y se considera importante.

Palabras clave: Salud mental; Internado y residencia; Percepción; Cursos (fuente: DeCS BIREME).

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INTRODUCTION

Mental health is a topic that has become more prominent in recent decades⁽¹⁾. Its importance has emerged in different aspects of life and contexts, taking priority in the development of communities, families, and workplaces⁽²⁾. Thus, stress, anxiety, and depression have become important in the development of policies of work and coexistence in different societies of the World⁽³⁾. In addition, the evolution in the importance of mental health has led to the emergence of laws, policies, and rights focused on the development of a balanced environment that seeks the protection of emotions and feelings⁽³⁻⁵⁾. Therefore, it has been understood that the elements of a healthy relationship are good interpersonal therapy and empathy^(6,7).

On the other hand, Medical professions must include mental and psychological aspect as an important part in the development of its protocols and working mechanisms⁽⁸⁾. Training in psychological and empathic skills must accompany medical training during all its stages: undergraduate⁽⁹⁻¹¹⁾ and postgraduate⁽¹²⁾. In this context, medical schools should encourage the training of professionals who can handle stressful situations⁽¹³⁾, establish an empathetic medical patient relationship⁽¹⁴⁾, and who can solve the mental health problems prevalent in society. According to this, the physician's role is not only to ensure the well-being of his patients but also to all areas involved in comprehensive care⁽¹⁵⁾. Therefore, it is important to implement the subject of mental health in the academic curriculum of pre-degree and post-degree programs of the human medicine career for the development of competent and empathetic professionals⁽¹⁶⁾. Therefore, the objective of this study is to determine the resident physician's perception of a mental health course during the last year of medical residency.

METHODS

Design and setting

Observational, descriptive, and transversal study in residents of Universidad Nacional Federico Villarreal.

Population and sample

The population of this study consisted of all residents of the different specialties that performed the medical specialty programs at the Universidad Nacional Federico Villarreal during the period from January 18 to February 18, 2020, which constituted a

total of 226 resident physicians. Those who attended the mental health class that is taught as a subject of the medical resident's program were included. A survey was applied to study participants at the end of the course. Resident physicians who did not attend the classes where the surveys were administered, as well as those who did not answer the survey nor did so incompletely, were excluded from the study. According to the above criteria, the study counted 130 resident physicians.

The technique used was nonprobability sampling and it was convenient to take advantage of the attendance to the regular classes of the course that were developed in the classrooms of the Hospital Nacional Victor Larco Herrera.

Variables and instruments

The main variable was the perception of the mental health course in the third year of residence. To measure it, we used a survey conducted by the authors and content validated by experts. The survey consisted of 10 objective questions that measured variables such as the importance of course concepts, the importance of mental health in the family and the community, the correct therapeutic approach to mental disorders, mental problems by life cycle, acceptance of course implementation, adequate course introduction, development of the procedural aspect, attitude to the course and perception of mental health reform. The answers were raised following the Likert model.

Procedures

This survey was applied during a class of the mental health course. Participation was openly voluntary and the verbal consent of each participant was requested. Subsequently, the data was processed in a database for which a Microsoft Excel 2016 program sheet was used.

Statistical analysis

Quantitative variables (which showed an asymmetric distribution) were described as age through medians and interquartile ranges, and categorical variables through frequencies and percentages. The distributions of the answers for each question were presented through frequencies and percentages. Also, it was explored the distribution of the different factors according to the answers in the question about the perception of relevance and acceptance of the course. The data were processed using the STATA 14.2 program.



Ethical aspects

During the development of the study, all ethical standards and principles of research were followed. The participants gave their verbal consent to participate in the project and ensured that their data could not be identified. All data collected for this study was deleted after being processed to meet the research objectives.

RESULTS

All the 130 participants, 57.69% were women. The marital status of the participants was 61.54% single and 27.69% married. The medical specialty with the largest number of people was Pediatrics, representing 13.85% of the total sample. Residents who were trained in clinical specialties accounted for 57.69%, and 58.46% were free-standing. The general characteristics of the study sample are shown in Table 1.

Table 1. General characteristics of resident physicians attending the mental health course during the third year of the medical resident.

Variables	Frequency n = 130	Percentage (%)
Sex		
Male	55	42.31
Female	75	57.69
Age		
	35*	30 - 38**
Marital status		
Married	36	27.69
Cohabiting	8	6.15
Divorced	6	4.62
Single	80	61.54
Type of medical residency		
Matched into a program	54	41.54
Free-standing	76	58.46
Type of medical residence		
Clinic	75	57.69
Surgical	17	13.08
Not specified	38	29.23
Medical Specialty		
Pediatrics	18	13.85
Internal medicine	10	7.69
Anesthesiology	8	6.15
Gynecology and obstetrics	6	4.62
Physical medicine and rehabilitation	6	4.62
Does not specify	38	29.23
Other specialties	44	33.84

** Medium.

** Interquartile range.

Regarding the perception of the mental health course and according to the items of the data collection instrument, it was obtained that 60% considered interesting the concepts and problems contained in the Mental health course, while 7.69% of residents found the procedural aspects

of the subject uninteresting. In addition, 58.46% had good acceptance of the mental health course during medical residency. Table 2 details the results obtained from the measuring instrument applied to the resident physicians who participated in the study.



Table 2. Descriptive assessment of the resident physicians' perception of the mental health course based on a measuring instrument.

	Items	Very interesting	Interesting	Regularly interesting	Little interesting	Not interesting
1	In your opinion, the concepts and problems of mental health that are shown in the syllable are?	24.62%	60%	12.31%	3.08%	No response
2	In your opinion, the mental health problems developed in the family and community are:	28.46%	59.26%	11.54%	0.77%	No response
3	In your opinion, the therapeutic approaches to mental disorders that will be described in the course are:	16.92%	57.69%	18.46%	5.38%	1.54%
4	In your opinion, the mental problems by life cycles that are showed in the subject are:	22.31%	57.69%	16.15%	3.85%	No response
7	In your opinion, the course development seems conceptual:	9.23%	66.92%	16.92%	6.15%	0.77%
8	To your perception, the development of the course in the procedural section seems to you:	7.69%	47.69%	33.08%	7.69%	3.85%
10	In your opinion, mental health reform in a community model seems to you:	16.92%	55.38%	23.85%	3.08%	0.77%
		Very good	Good	Regular	Bad	None
5	What is your acceptance of the implementation of the Mental Health course in the residency?	17.69%	58.46%	22.31%	0.77%	0.77%
6	Do you find it appropriate to introduce the subject in the last year of residency?	8.46%	40.00%	33.85%	16.92%	0.77%
9	Your attitude in the development of the subject is:	13.85%	64.62%	16.92%	3.08%	1.54%

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When performing the bivariate analysis on the relevance of the mental health course, it was found that 62.96% of respondents of ages 25 – 35 years considered the course interesting (p = 0.038). In addition, 53.7% of residents matched into a program

described the course to be "interesting" and 64.47% of the free-standing residents considered it to be "interesting" (p = 0.005). The other data from the analysis are detailed in Table 3.



Table 3. Bivariate analysis of the participant's opinion on the relevance of the course according to age range, gender, marital status, type of medical residency, and mode of residency.

	Very interesting	Interesting	Regularly interesting	Little interesting	p-value
Age range					
A (25 - 35 years)	13 (16.05%)	51 (62.96%)	14 (17.28%)	3 (3.70%)	0.038
B (36 - 45 years)	12 (33.33%)	21 (58.33%)	2 (5.56%)	1 (2.78%)	
C (46 - 65 years)	7 (57.85%)	6 (46,15%)	No answer	No answer	
Sex					
Female	18 (24%)	48 (64%)	8 (10.67%)	1 (1.33%)	0.471
Male	14 (25.45%)	30 (54.55%)	8 (14.55%)	3 (5.45%)	
Civil status					
Married	11 (30.56%)	21 (58.33)	2 (5.56%)	2 (5.56%)	0.308
Cohabiting	3 (37.50%)	4 (50%)	No answer	1 (12.50%)	
Divorced	1 (16.67%)	4 (66.67%)	1 (16.67%)	No answer	
Single	17 (21.25%)	49 (61.25%)	13 (16.25%)	1 (1.25%)	
Residence type					
Clinic	17 (22.67%)	49 (65.33%)	7 (9.33%)	2 (2.67%)	0.326
Surgical	3 (17.65%)	10 (58.82%)	2 (11.76%)	2 (11.76%)	
Modality					
Captive	21 (38.89%)	29 (53.7%)	3 (5.56%)	1 (1.85%)	0.005
Free	11 (14.47%)	49 (64.47%)	13 (17.11%)	3 (3.95%)	

The values of p were calculated by Fisher's exact test.

The bivariate analysis on the acceptance of the mental health course found that 72.2% of residents between 36 and 45 years of age had good acceptance of the mental health course during the medical resident (P = 0.021). 58.82% of those who performed a

surgical specialty showed good disposition towards the subject of mental health (p = 0.053) adjusted according to age range, gender, marital status, type of residency, and mode of residency. The details of the analysis can be found in Table 4.



Table 4. Bivariate analysis of the acceptance of the mental health course according to age range, gender, marital status, type of residency, and mode of residency.

	Very good	Good	Regular	Bad	None	p-value
Rango de edad						
A (25 - 35 years)	12 (14.81%)	44 (54.32%)	24 (29.63%)	1 (1.23%)	No answer	0.021
B (36 - 45 years)	5 (13.89%)	26 (72.22%)	4 (11.11%)	No answer	1 (2.78%)	
C (46 - 65 years)	6 (46.15%)	6 (46.15%)	1 (7.69%)	No answer	No answer	
Sex						
Female	15 (20%)	44 (58.67%)	15 (20%)	No answer	1 (1.33%)	0.627
Male	8 (14.55%)	32 (58.18%)	14 (25.45%)	1 (1.82%)	No answer	
Marital status						
Married	3 (8.33%)	24 (66.67%)	7 (19.44%)	1 (2.78%)	1 (2.78%)	0.308
Cohabiting	1 (12.50%)	5 (62.50%)	2 (25%)	No answer	No answer	
Divorced	1 (16.67%)	4 (66.67%)	1 (16.67%)	No answer	No answer	
Single	18 (22.50%)	43 (53.75%)	19 (23.75%)	No answer	No answer	
Type of residence						
Clinic	18 (24%)	41 (54.67%)	14 (18.67%)	1 (1.33%)	1 (1.33%)	0.053
Surgical	0	10 (58.82%)	7 (41.18%)	No answer	No answer	
Modality						
Matched into a program	10 (18.52%)	35 (64.81%)	8 (14.81%)	No answer	1 (1.85%)	0.218
Free-standing	13 (17.11%)	41 (53.95%)	21 (27.63%)	1 (1.32%)	No answer	

The values of p- were calculated with Fisher's exact test.

DISCUSSION

In our study, we found that 62.96% of participants of the A group considered the contents of the mental health course important during medical residency. This contrasts with a study done with undergrad students who, after an internship in mental health understood that the human being is not only composed of biological aspects but also psychological, social, cultural, and spiritual⁽¹⁷⁾. It is interesting to mention the relevance of these findings. Chau and Vilela, a study conducted in 1024 university students from Lima and Huanuco showed that the mental health of the students was determined by variables such as perceived stress, feeling of self-efficacy, career, type of study, institution, among

others⁽¹⁸⁾. Residents within this age group do not only face the job challenges that correspond to the needs of hospital service but also they are exposed to the common problems of their age group. It is for this reason that Ovalle-Peña et. al. tried to understand the most common problems in young adults that could lead them to severe depressive states. A qualitative study of 25 people of 25 - 40 years of age was done using the "The State-Trait Depression Scales" and concluded that at this age there is an emotional lack of control, personality problems, a tendency towards depression, and remarkable emotional instability⁽¹⁹⁾.

On the other hand, 64.47% of the residents who were in the free-standing modality considered as interesting the topics contained in the mental health



course. This finding is relevant in the context of the job instability that many of these professionals experience especially at the end of their training years as specialists. Therefore, to affirm that a big interest of the participants is to be able to handle situations of stress or anxiety as a result of the finalization of residency and initiation in the labor field, which in many cases will be their first work experience, is not out of context⁽²⁰⁾. In addition, we must add that, among the participants, 27.69% were married. Therefore, in a situation of possible unemployment plus family burden the proper management of depressive or anxious situations takes a special interest in these professionals. This situation was seen by Ponce et al. in residents of a private hospital in the city of Córdoba, Argentina of 159 residents, a percentage of them had developed clinical Burnout syndrome and the others suffered from stress or some degree of anxiety⁽²¹⁾.

In the age range C (46-65 years) 46.15% of participants had a "very good" acceptance of the subject. These results show a reality less explored within the medical field. The acceptance of the course may be a result of the need for professionals of this age to be able to cope with continuous stressful situations in their work. The contact with younger professionals performing the same specialty, family burdens, and pressures of their work centers to obtain a specialty come into play in the emotional stability of this group⁽²²⁾.

For this reason, when Ortuño et. al. evaluated patients within this age group in a sample of 674 people found that 27.6% had depressive syndromes that required pharmacological treatment and 71% were women⁽²³⁾.

Based on the findings of this study, it is important to implement strengthening programs of mental health. An example of this was done by The John A. Burns School of Medicine at the University of Hawai'i system which provides individual counseling services. This resulted in a significant decrease in depressive symptoms as well as reported suicidal thoughts in students⁽²⁴⁾. Similarly, a much larger program was instituted at The University of California, San Diego

School of Medicine, focusing on the mental health of medical students, residents, and faculty physicians. The program was well accepted by faculty members⁽²⁵⁾.

Also, it has been reported that doctors with better mental health, are in a position to provide a better service to their patients and strengthen the physician-patient relationship. They do not only provide a more friendly and empathetic service but also, detect mental health problems that may interfere in the course of the disease, and take the necessary measures in a timely manner⁽²⁶⁾.

One of the limitations of our study was the selection bias as the sample was non-probability sampling and was taken for the convenience of a class of the subject of Mental Health. Also, the study did not consider specialists who had just graduated from the residencies. The problems of this population can be explored in future research.

CONCLUSION

Students in their last year of residency in medical school considered the subject of Mental Health important and relevant. It was concluded, that the youngest residents considered the content and procedure of the course to be "good" and "acceptable".

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BIBLIOGRAPHIC REFERENCES

1. Bravo-Sanzana M, Salvo S, Mieres-Chacaltana M. La importancia de la salud emocional en la escuela, un factor a considerar para la mejora de la salud mental y los logros en el aprendizaje. *Salud Pública México*. 2015;57:111-2. Disponible en: <https://www.scielosp.org/article/spm/2015.v57n2/111-112/es/>
2. Vélez MAG, Carrascal PAC. Salud mental en el trabajo: entre el sufrimiento en el trabajo y la organización saludable. *Katharsis*. 2017;1(23):189-217. DOI: <https://doi.org/10.25057/issn.2500-5731>
3. Hespanhol Bernardo M, De Souza HA, Garrido Pinzón J, Kawamura EA. Salud mental relacionada con el trabajo: desafíos para las políticas públicas. *Univ Psychol*. 2016;14(5):1613-1623. DOI: <https://doi.org/10.11144/Javeriana.upsy14-5.smr>
4. De la Fuente JR, Heinze G. Salud mental y medicina psicológica [Internet]. McGraw-Hill Interamericana Editores; 2015. Disponible en: <http://totorus.tic.unam.mx/9912/pdf/99delafuente.pdf>
5. Errázuriz P, Valdés C, Vöhringer PA, Calvo E. Financiamiento de la salud mental en Chile: una deuda pendiente. *Rev Médica Chile*. 2015;143(9):1179-86. DOI: <http://dx.doi.org/10.4067/S0034-98872015000900011>
6. Esquerda M, Yuguero O, Viñas J, Pifarré J. La empatía médica, ¿nace o se hace? Evolución de la empatía en estudiantes de medicina. *Aten Primaria*. 2016;48(1):8-14. DOI: [10.1016/j.aprim.2014.12.012](https://doi.org/10.1016/j.aprim.2014.12.012)
7. Dezaphi JB. Nacionalismos, racismo, xenofobia, migraciones. *Tiempo Paz*. 2018;1(130):55-62. Disponible en: <https://dialnet.unirioja.es/servlet/articulo?codigo=6829745>
8. Panizo G, Renzo R. Prevalencia de depresión en pacientes hospitalizados en el servicio de medicina interna en un hospital nacional febrero 2015. [Tesis de Titulación]. [Lima]: Universidad Nacional Mayor de San Marcos; 2015, 43 p. Disponible en: <http://cybertesis.unmsm.edu.pe/handle/cybertesis/4139>
9. Vilchez-Cornejo J, Quiñones-Laveriano D, Failoc-Rojas V, Acevedo-Villar T, Larico-Calla G, Mucching-Toscano S, et al. Salud mental y calidad de sueño en estudiantes de ocho facultades de medicina humana del Perú. *Rev Chil Neuro-Psiquiatr*. 2016;54(4):272-81. DOI: <http://dx.doi.org/10.4067/S0717-92272016000400002>
10. Mejía CR, Valladares-Garrido MJ, Talledo-Ulfe L, Sánchez-Arteaga K, Rojas C, Arimuya JJ, et al. Síndrome de Burnout y factores asociados en estudiantes de medicina: Estudio multicéntrico en siete facultades de medicina peruanas. *Rev Chil Neuro-Psiquiatr*. 2016;54(3):207-14. DOI: <http://dx.doi.org/10.4067/S0717-92272016000300005>
11. Serrano FT, Salguero-Sánchez J, Ayala-Fernández J, García-Torres MF, Meza JC, Mejía CR. Síndrome de Burnout en estudiantes de seis facultades de medicina de Colombia, 2016-1: estudio multicéntrico. *CIMEL*. 2016;21(2):29-34. Disponible en: <https://www.cimel.felsocem.net/index.php/CIMEL/article/view/642>
12. Vargas-Terrez BE, Moheno-Klee V, Cortés-Sotres JF, Heinze-Martin G. Médicos residentes: rasgos de personalidad, salud mental e ideación suicida. *Investig En Educ Médica*. 2015;4(16):229-35. DOI: <http://dx.doi.org/10.1016/j.riem.2015.08.001>
13. Daniel Guerrero AB, Rodríguez Reyna CA, Morales López S, Pizá Aragón A. Estrés emocional en estudiantes de Medicina de la Universidad Autónoma de México. *Humanidades Médicas*. 2017;17(3):497-515. Disponible en: http://scielo.sld.cu/scielo.php?script=sci_arttext&pid=S1727-81202017000300006&lng=es
14. Rodríguez D, Vanessa K. Empatía en la relación médico-paciente: miradas en diferentes etapas de formación y experiencia profesional. [Tesis de Titulación] [Bogotá]; Universidad Externado de Colombia; 2018. 92 p. Disponible en: <https://bdigital.uexternado.edu.co/handle/001/1024>
15. Valenzuela Oré F, Salaverry García O, Monteza Facho BM, Fuentes Delgado D, Trujillo Villarroel O, Vilchez Buitrón E, et al. Percepción del usuario sobre los servicios de salud de la comunidad de Chopcca, Huancavelica, desde una mirada intercultural (Resultado preliminar). *Boletín Inst Nac Salud* 2015;21((1-2)):16-7. Disponible en: <https://repositorio.ins.gob.pe/handle/INS/325>
16. Alvarez AI. La enseñanza de la psicología en la Universidad de Puerto Rico, Recinto de Río Piedras: 1903 - 1950. *Rev Puertorriqueña Psicol*. 2016;9(1):13-29. Disponible en: <http://www.ojs.repsasppr.net/index.php/reps/article/view/72>
17. Camillo S de O, Silva AL da, Nascimento AJ do. Perceptions of nursing undergraduate students concerning the human dimension in the learning process. *Rev Lat Am Enfermagem*. 2007;15(2):207-13. DOI: <https://doi.org/10.1590/S0104-11692007000200004>
18. Chau C, Vilela P. Determinantes de la salud mental en estudiantes universitarios de Lima y Huánuco. *Rev Psicol PUCP*. 2017;35(2):387-422. DOI: <http://dx.doi.org/10.18800/psico.201702.001>
19. Ovalle-Peña O, Alejo-Riveros A, Tarquino-Bulla LC, Prado-Guzmán K. Relación entre depresión y rasgos de personalidad en jóvenes y adultos con conducta intencional suicida de Ibagué, Colombia. *Rev Fac Med*. 2017;65(2):211-7. DOI: <https://doi.org/10.15446/revfacmed.v65n2.59004>
20. Guevara-Cotrino Y, Saucedo-Chinchay JL, Díaz-Vélez C, Soto-Cáceres V. Perfil y situación laboral del médico joven egresado de una facultad de medicina de Lambayeque, 2013. *Acta Médica Peru*. 2016;33(2):111-8. Disponible en: http://www.scielo.org.pe/scielo.php?script=sci_arttext&pid=S1728-59172016000200004&lng=es
21. Ponce LB, Gavotti GC, Ferreyra L, Flores M. Síndrome de Burnout en médicos residentes del Hospital Privado. Año 2013. *Exp Médica*. 2016;33(1):8-11. Disponible en: <https://www.experienciamedicahp.com.ar/uploads/articulo-original-2-6136.pdf>
22. Ansoleaga E. Indicadores de salud mental asociados a riesgo psicosocial laboral en un hospital público. *Rev Médica Chile*. 2015;143(1):47-55. DOI: <http://dx.doi.org/10.4067/S0034-98872015000100006>
23. Ortuño N, Cobo J, González E, García I, Ferrer M-D, Campos C, et al. Tratamiento antidepressivo y asociación con el ingreso urgente en unidades médicas en pacientes de 65 años o mayores. *Rev Psiquiatr Salud Ment*. 2016;9(4):210-8. DOI: [10.1016/j.rpsm.2015.01.004](https://doi.org/10.1016/j.rpsm.2015.01.004)
24. Thompson D, Goebert D, Takeshita J. A program for reducing depressive symptoms and suicidal ideation in medical students. *Acad Med J Assoc Am Med Coll*. 2010;85(10):1635-9. DOI: [10.1097/ACM.0b013e3181f0b49c](https://doi.org/10.1097/ACM.0b013e3181f0b49c)
25. Moutier C, Norcross W, Jong P, Norman M, Kirby B, McGuire T, et al. The Suicide Prevention and Depression Awareness Program at the University of California, San Diego School of Medicine. *Acad Med*. 2012;87(3):320-326. DOI: [10.1097/ACM.0b013e31824451ad](https://doi.org/10.1097/ACM.0b013e31824451ad)
26. Brooks SK, Gerada C, Chalder T. Review of literature on the mental health of doctors: Are specialist services needed? *Journal of Mental Health*. 1 de abril de 2011;20(2):146-56. DOI: <https://doi.org/10.3109/09638237.2010.541300>

