

Analysis of midwives' situation and the need to measure their workloads

Análisis de la situación de las matronas y necesidad de medir sus cargas de trabajo Análise da situação das parteiras e a necessidade de medir suas cargas de trabalho

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How to cite this article:

Gómez García L, Seva Llor AM, Hellín Gil MF, Roldán Valcárcel MD, Paredes Cerezo P, Iglesia Cano E, et al. Analysis of midwives' situation and the need to measure their workloads. Rev Bras Enferm. 2022;75(Suppl 3):e20210920. https://doi.org/10.1590/0034-7167-2021-0920

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EDITOR IN CHIEF: Álvaro Sousa ASSOCIATE EDITOR: Maria Itayra Padilha

Submission: 02-09-2022 **Approval:** 05-13-2022

ABSTRACT

Objective: to analyze midwives' employment situation of midwives and detect their workload measurement needs. **Methods:** a mixed methodology (quantitative and qualitative), observational, descriptive and cross-sectional study. Two phases were carried out. The first methodological phase consisted of conducting semi-structured individual interviews. The second methodological phase analyzed the Nursing Intervention Classification (NIC) interventions that midwives perform in the labor room during daily practice. **Results:** 90.3% of midwives have work overload, since for 80.6% the midwife-pregnant mother ratio is not well established, since the mean execution time of a Nursing Intervention Classification (NIC) intervention is 20 minutes. For this reason, 100% of the sample considers the development of workload measurement tools to be highly useful. **Conclusions:** the need to generate an instrument that considers the diversity of Nursing Intervention Classification (NIC) interventions that develop within the labor room is ratified.

 $\textbf{Descriptors:} \ \mathsf{Midwife}; Workloads; Standardized \ \mathsf{Nursing} \ \mathsf{Terminology}; Scale; Burnout.$

RESUMEN

Objetivo: Analizar la situación laboral de las matronas y detectar sus necesidades de medición de cargas de trabajo. **Métodos:** Estudio de metodología mixta (cuantitativo y cualitativo), observacional, descriptivo y transversal. Se realizaron dos fases: La primera fase metodológica, consistió en la realización de entrevistas individuales semiestructuradas. Y en la segunda fase metodológica, se analizaron las intervenciones de enfermería (NIC) que las matronas efectúan en paritorio durante su jornada asistencial. **Resultados:** El 90,3% de las matronas presentan sobrecarga en el trabajo, pues para el 80,6% el ratio matrona- gestante no se encuentra bien establecido; pues tiempo medio de ejecución de una intervención de enfermería (NIC), es de 20 minutos. Por ello, el 100% de la muestra considera de máxima utilidad el desarrollo de herramientas de medición de cargas de trabajo. **Conclusiones:** Se ratifica la necesidad de generar un instrumento que considere la diversidad de intervenciones de enfermería (NIC) que desarrollan dentro del paritorio.

Descritores: Matrona; Cargas de Trabajo; Terminología Estandardizada Enfermería; Escala; Burnout.

RESUMO

Objetivo: analisar a situação laboral das parteiras e detectar suas necessidades de mensuração da carga de trabalho. Métodos: estudo de metodologia mista (quantitativa e qualitativa), observacional, descritivo e transversal. Duas fases foram realizadas. A primeira fase metodológica consistiu na realização de entrevistas individuais semiestruturadas. A segunda fase metodológica analisou as intervenções da Classificação de Intervenção de Enfermagem (NIC) que as parteiras realizam na sala de parto durante o dia de atendimento. Resultados: 90,3% das parteiras apresentam sobrecarga de trabalho, pois, para 80,6%, a relação obstetriz-gestante não está bem estabelecida, pois o tempo médio de execução de uma intervenção Classificação de Intervenção de Enfermagem (NIC) é de 20 minutos. Por esse motivo, 100% da amostra considera muito útil o desenvolvimento de ferramentas de medição de carga de trabalho. Conclusões: ratifica-se a necessidade de gerar um instrumento que considere a diversidade de intervenções Classificação de Intervenção de Enfermagem (NIC) que se desenvolvem na sala de parto.

Descritores: Parteira; Cargas de Trabalho; Intervenções NIC; Instrumento de Medição; Burnout.

ONLINE VERSION ISSN: 1984-0446

INTRODUCTION

Midwifery is essential for assisting women during normal childbirth, identifying complications or deviations from normality⁽¹⁻²⁾. Also, 95% of the time required for each childbirth is always under their care⁽³⁾. The lack of these professionals is considered a barrier to humanized care in childbirth⁽⁴⁾. The Federation of the Association of Midwives of Spain (FAME - Federación de Asociación de Matronas de España) speaks of the need for "a midwife for a woman" to achieve individual and continuous care^(3,5).

The childbirth service is the place where nursing care generated by a highly qualified professional profile, such as midwives, is established. Midwives in the hospital environment carry out a large number of activities, in terms of efficacy, efficiency, effectiveness, accessibility, seeking user satisfaction, as well as continuity of care, maintaining safety at all times. Care is not only valued in terms of the number of activities carried out, but also for the quality with which they are carried out, to take another step towards excellence in the care provided to society⁽⁶⁾. A more empowered society in the times we live in, which increasingly demands health services, adapted not only to the demographic, social and multicultural changes that we have, but also to the emergence of new pathologies⁽⁷⁾. This changing scenario means spending time on health care, which on many occasions generates work overload, all in a context of economic crisis characterized by budget adjustments and cost containment⁽⁸⁾. This situation highlights the priority of determining and examining the workloads to which they are subjected(9-11).

According to the data offered from the quantified ratios of a study carried out by the Organization for Economic Cooperation and Development (OECD - *Organización para la Cooperación y el Desarrollo Económico*) in relation to the mean number of midwives per 1,000 inhabitants, Spain does not reach the mean of 0.3, since its mean barely close to 0.1^(2-3,12-13). Moreover, when analyzing in depth the ratio of midwives according to 1,000 births and 100,000 women, we find very different data depending on the European country studied, with a significant discrepancy between the data from Spain in relation to OECD countries^(2-3,12-13). It can be deduced that Spain is well below the European average, with the lowest values of the countries studied.

From this perspective, using the Nursing Intervention Classification (NIC) provides support in planning and assessment of nursing workload, because the NIC is a theoretical-methodological framework to dictate those interventions and activities that are part of the care function of midwives during birth, thus identifying their workload⁽¹⁴⁾. To counter the situation described, it is necessary to assess whether this professional profile considers it necessary to estimate their workloads, through the generation of an instrument that quantifies them based on the reality of care and associated with the number of midwives that make up the multidisciplinary team.

OBJECTIVE

To analyze midwives' employment situation and detect their workload measurement needs, analyzing the NIC interventions they carry out in their daily practice.

METHODS

Ethical aspects

The commitment to ethical research standards and the essential legal requirements for carrying out this study was scrupulously fulfilled. This study is part of a doctoral thesis, and was approved by the Research Ethics Committee of the participating entities.

Special attention was given to compliance with the following ethical aspects: voluntariness, anonymity and confidentiality when participation in the research. Law 3/2018, of December 5, Protection of Personal Data and guarantee of digital rights was respected.

Study design, period, and place

After a previous and updated scientific literature review on workloads, specifically those related to midwives, within the Childbirth Unit, a mixed methodological (quantitative and qualitative), observational, descriptive and cross-sectional study was designed. To achieve the proposed objective, two steps were carried out.

The first methodological phase consisted of individual semistructured interviews carried out by videoconference with obstetric professionals. The second methodological phase analyzed the NIC interventions that midwives perform in the labor room during daily practice, quantifying both the frequency and the time allocated to each of them. The selected childbirth unit is located at the *Hospital Clínico Universitario Virgen de la Arrixaca* (HCUVA). The completion of both phases took place during 2020-2021.

Population or sample: inclusion and exclusion criteria

The study subjects, since the first methodological phase, were midwives who work at public hospitals network of the National Health System in Spain. A non-probabilistic and convenience sampling was carried out to carry out the interviews, establishing a series of inclusion and exclusion criteria. We included professionals over 18 years old, certified nurses in obstetrics - gynecology (midwife) on active duty. We excluded midwives in an RIN residency regime (Resident Internal Nurse) and who worked in the private health network at the time of the study. A sample of 31 midwives was obtained.

The data saturation criterion, i.e., inclusion of new participants, was suspended when no new explanations, interpretations or descriptions of the phenomenon studied were found. In the second methodological phase, a sample of midwives from the HCUVA was randomly selected to measure the time they spend performing each of the proposed NIC interventions during their work shift.

Study protocol

In the first phase, data were compiled through an *ad hoc* semi-structured individual interview based on literature review, consisting of 42 questions (17 closed-ended questions of a dichotomous nature, 7 closed-ended questions of a polytomous nature and 18 open-ended questions), divided into three chunks. The first collects information on sociodemographic variables (age,

sex, marital status, number of children). The second investigates socio-clinical variables (work center, city or place of work, type of hospital, years of experience, current and previous position). And the third includes the variables of interest collecting work and professional data (skills and activities within the labor room, number of midwives that make up the multidisciplinary team, physical structure of the childbirth unit, consideration of workloads and their consequences).

From these variables, we focused on knowing the opinion on the adequacy of workloads, the factors that can cause overload and the need to use instruments that measure that workload to which they are exposed. After data collection, a pilot study of a sample of 10 interviews was carried out to verify the questionnaire reliability and thus validate the final interview understanding and adequacy. Once the data from the interviews, carried out between May-June 2020 had been collected, the work objective quantification began, for which the variables studied in the interviews were listed, corresponding to the professional activities described by the sample.

Subsequently, a mapping of these activities was carried out, to catalog them with each of the corresponding NIC interventions. Then, a data collection notebook was prepared in order to quantify the real time, in minutes, dedicated to each intervention. This data collection notebook is structured in rows and columns. Lines were used to group the time in minutes observed in the accomplishment of each intervention, and columns, to describe each intervention to be measured. The second phase focused on fieldwork. The times that a random sample of midwives used to perform a battery of NIC interventions identified in the previous phase, in March and April 2021, were timed. For this, the HCUVA childbirth unit was selected. This unit is structured in 18 labor rooms, with a team of 7 midwives per shift.

To obtain the data, two digital stopwatches from mobile devices (Redmi Note 8T and Apple iPhone) were used, with the participation of two researchers, in order to establish the minimum statistical discrepancy in the quantification of measured time. Before the start of measurement, the researchers verified that the measuring instruments worked and had the same characteristics, agreeing at the beginning and at the end of each intervention.

Based on quality criteria, a total of 30 to 66 measures were established, of the time dedicated to each NIC intervention. Furthermore, interruptions in the activities that were being carried out were taken into account, making stops on the stopwatch, until the activity was resumed, using methodologically the sum of the times for the final count.

Data analysis, and statistics

The results of the interviews were analyzed qualitatively, through the specific Atlas.ti software, and quantitatively. The data obtained in fieldwork were processed with SPSS version 23.0, performing a descriptive analysis, calculating frequencies and contingency tables between the different variables. The chi-square test was used to calculate statistical significance and a statistical significance level of 95% (p<0.05). And the correlation of data obtained with data dictated by NANDA for each NIC intervention was performed.

RESULTS

The interviews were carried out with a sample of thirty-one midwifery professionals (n=31), composed of 87.1% women and 12.9% men. Their mean age is 39.71 years, with a minimum age of 28 years and a maximum of 57 years. Also, 67.7% were married, 22.6% were single and 9.7% were divorced, and 77.4% have children. Our sample has been midwifery for an average of 10 years. The average number of midwives in the day shift is 4.97 and 4.90 in the night shift, exercising their professional work within the scope of specialized care, specifically in the childbirth unit. And 100% of the sample knows what their skills are as well as the professional activities they carry out within the unit. If we focus on their professional advancement, 16.1% held management positions in health, against 83.9% who throughout their professional career only worked as midwives in the hospital environment. The most representative management position is that of childbirth unit supervisor, with 12.9%.

When delving deeper into the workloads to which the interviewed midwives are subjected, 61.3% of the sample consider that their workloads are not adequate, against 38.7% who consider them adequate. Moreover, 90.3% recognize having felt overload at work, as 32.1% and 28.6% of the sample express increased workload and poor organization as perceived overload factors, stating: "The overload is experienced by the lack of personnel, I am alone for everything that happens in the service, we work carrying out an infinity of tasks and activities at the same time and in addition we must add the lack of planning of the agendas processes, the increase in maternal-fetal pathology and the current organizational structure due to the health pandemic". For 100%, this work overload has consequences for pregnant women, their future children and for themselves as health professionals (Table 1).

When considering the midwife/pregnant mother relationship, 80.6% of midwives in our sample think that this relationship is not well established to provide quality care, for which they stated "In the current working conditions, it is not possible to comply with one-to-one, which represents a significant reduction in the individualized care of mother-child". Thus, 100% of respondents consider it necessary to measure the workloads they are exposed to. And 80.6% recognize not knowing any tool that measures workloads and 96.8% believe in its usefulness. Considered useful for adapting work models, proportions and staffing needs, as 100% of midwives in the sample believe that the application of a workload measurement tool within the childbirth service could generate profitability for predefining the midwife-surrogate mother relationship, when exposing: "These measurement tools would allow us to objectively measure the need for personnel required by the service to provide quality service and would justify our work, as we currently do not have a record where we can see the total number of activities carried out during our working day, other than those due to the birthing process".

When crossing sociodemographic variables with socio-clinical and labor variables (Table 2), we obtained in the association between the past practice of nursing and the current burden in the practice of obstetrics, a significance of p=0.046. Furthermore, professionals who consider their workloads to be inadequate feel this overload with a significance of p=0.022.

We found a relationship between the consequences and the psychological impact that work overload has on health professionals (midwives) with p=0.0032. The psychological affect experienced by this professional profile is linked to current midwife-pregnant mother relationships; these indices have a direct influence on the perceived workload, with a significance level of p=0.029. The midwives interviewed consider it necessary to use the instruments to measure workload so that they can adjust the models, proportions and adjust the need for personnel with p=0.004, as they express that they are subject to overload in their daily work.

Regarding the data obtained in fieldwork, with an observation time of 120 hours, we found a discrepancy between the volume of real time measured for the different NIC interventions and the time agreed by this international taxonomic group. Those interventions that required greater presence of a midwife, during the actual measurement, were those of assistance activity and direct and indirect mother-child care, with times ranging from 60 minutes to 48 minutes. Below we show the discrepancy of data obtained in the measurement of real times with those extracted from the times agreed by the NIC (Table 3).

The mean time to perform each of the NIC interventions, measured in the study, is 20 minutes, compared to 33 minutes determined by the NIC itself. When performing the correlation of both samples, we found statistical significance with p=0.000, which determines the discrepancy in the determination of the two times.

DISCUSSION

The midwives interviewed expressed their concern and the need to adapt the staff to the current demands of care, due to the work overload that 90.3% of the sample has been experiencing. The adequacy of these health personnel aims to improve not only the quality of care provided to the mother-child binomial, but also the quality of the health personnel's work, guaranteeing the model of childbirth care proposed by the World Health Organization (WHO) in 2018. This international model of global nursing frames essential care during childbirth allowing for woman-centered care, always based on human rights. Achieving a "positive childbirth experience" implies an experience that meets or exceeds the woman's previous personal and sociocultural beliefs and expectations, as these guidelines are not specific to any country or region, and recognize global differences in the level of health services available within and between countries(15). The midwives in our study confirm that the midwife/pregnant mother relationship is not well established, making it difficult, on many occasions, to be able to provide individualized, continuous care and to empower pregnant women over her own birth process, as confirmed in other studies⁽⁵⁾. And as determined by the study by Hausman (2005), the ratios allow an objective approximation of work volume, since the greater care pressure and the large number of tasks to be performed in the labor room was one of the main reasons why they did not could provide ongoing support to women⁽⁴⁾.

Table 1 - Consequences of midwives' work overload

Consequences	Types	n	%
Pregnant woman	Loss of quality service	28	90.3
	Loss of quality of care coupled with poor service organization Poor attention due to exhaustion	1	6.5 3.2
Newborn	Not being able to provide immediate care and initiation of breastfeeding Situation of non-adaptation to extrauterine life	7 6	22.6 19.4
	Loss of quality service No initiation of skin-to-skin contact	16 1	51.6 3.2
Professional	Physical-mental overload Psychological affection	6 21	79.4 67.7
	Stress and obsolete work Burnout	1 2	3.2 6.2

Table 2 - Crossing socio-clinical variables and workloads

Socio-clinical data	Yes, work overload		No, work overload		p
	n	%	n	%	
Yes, you practiced the nursing profession	27	93.1	2	6.9	.046
No, you did not practice the nursing profession	1	50	1	50	.046
Workloads are adequate	9	75	3	25	.022
Workloads are not adequate	19	100	0	0	.022
Workloads have consequences on the surrogate	28	90.3	3	9.7	
Workloads do not have consequences on the surrogate	0	0	0	0	
Workloads have consequences on newborns	27	90	3	10	.739
Workloads do not have consequences on newborns	1	100	0	0	.739
Workloads have consequences in midwives	28	90.3	3	9.7	
Workloads do not have consequences in midwives	0	0	0	0	
The midwife/pregnant ratio is adequate	4	66.7	2	33	.029
The midwife/pregnant ratio is not adequate	24	96	1	4	.029
Yes, workloads need to be measured	28	90.3	3	9.7	
No, workloads do not need to be measured	0	0	0	0	
Workload measurement tools are useful	27	90	3	10	.739
Workload measurement tools are not useful	1	100	0	0	.739
Workload measurement tools are cost-effective to set the ratio	28	90.3	3	9.7	
Workload measurement tools are not cost-effective to set the ratio	0	0	0	0	

Table 3 - Quantification of the mean time required for each Nursing Intervention Classification (NIC) intervention in relation to Nursing Intervention Classification (NIC) data, in minutes

NIC	Times measured	NIC times
1801. Self care assistance: bathing and hygiene	3	15
6540. Infection control	38	38
2300. Medication administration	4	15
2380. Medication management	4	23
2314. Medication administration: intravenous (IV)	4	15
4200. Intravenous therapy (IV)	4	15
2313. Medication administration: intramuscular (IM)	15	15
2304. Administration of medication: oral	15	15
2318. Medication administration: vaginal	15	15
2311. Medication administration: inhalation	15	15
2214. Analgesic administration: intraspinal	3	23
2319. Medication administration: intraspinal	3	15
7820. Specimen management	2 12	15 23
5510. Health education 5568. Parenteral education: infant	12	25 38
	12	
5244. Lactation counselling		38
5618. Teaching: procedure/treatment	12	23 15
100. Nutrition management	12 9	
3740. Fever treatment	5	23 15
4190. Intravenous (IV) insertion	5	15
1235. Phlebotomy: cannulated vessel 1238. Phlebotomy: venous blood sample	5 5	15 15
१८३४. Priedotomy: venous blood sample १०३५. Capillary blood sample	3	15 15
3620. Suturing	3 14	23
1750. Perineal care	14	25 15
	2	15
5680. Vital signs 5771. Electronic fetal monitoring: antepartum	60	60
5771. Electronic letal monitoring: antepartum 5772. Electronic fetal monitoring: intrapartum	60	60
840. Postural change	1	23
6482. Environmental management: comfort	1	25 15
7140. Family support	12	60
5250. Decision-making support	12	23
5270. Emotional support	12	23
5420. Spiritual support	12	23
4920. Active listening	12	23
5440. Support system enhancement	12	38
5340. Presence	12	23
5460. Contact	12	15
6710. Attachment promotion	12	22
6800. High-risk pregnancy care	12	60
7310. Admission activities	12	23
6520. Health screening	12	53
5520. Health screening 6574. Patient identification	12	20
7960. Health care information exchange	1	15
7920. Documentation	15	15
6656. Surveillance: late pregnancy	12	60
7650. Delegation	2	15
3100. Referral	23	23
5720. Birthing	38	60
5830. Intrapartal care	55	60
5834. Intrapartal care: high-risk childbirth	55	60
5972. Resuscitation: fetus	1	60
5294. Grief work facilitation: perinatal death	38	38
1770. Post-mortem care	23	23
5750. Cesarean section care	48	38
2880. Preoperative coordination	48	38
2930. Surgical preparation	48	53
7710. Support for the doctor	14	23
2870. Postanesthesia care	29	53
6824. Infant care: newborn	2	60
5974. Resuscitation: neonate	6	53
5930. Postpartal care	5	60
7370. Discharge planning	5	53
3140. Shift report	4	38
6850. Labor induction	60	60
7840. Supply management	8	23
7980. Incident reporting	1	23
7880. Technology management	3	15
7660. Emergency cart checking	8	15
	3	38
5486. Environmental management: safety	3	

To be continued

NIC	Times measured	NIC times
8020. Multidisciplinary care conference	6	60
7830. Staff supervision: quality management	60	60
7640. Clinical path development	60	60
8700. Program development	60	60
7800. Quality monitoring	60	60
7726. Preceptor: student	23	60
7222. Preceptor: employee	23	60
8120. Research data collection	23	23
6140. Cardiac arrest	38	38
6320. Resuscitation	23	23
4030. Blood products administration	60	60
580. Urinary catheterization: intermittent	2	15
6630. Seclusion	3	60
1480. Massage	12	15
5880. Calming technique	12	38
1380. Heat/cold application	12	15
2400. Patient-controlled analgesia (PCA) assistance	3	23
1410. Pain management: acute	29	38
4026. Bleeding reduction: postpartum uterus	53	53
6860. Labor suppression	60	60
6870. Lactation suppression	23	23
1052. Bottle feeding	38	38
4021. Bleeding reduction: antepartum uterus	53	53
6522. Breast examination	15	15
2910. Surgical instrumentation management	60	60

Due to greater care pressure, dissatisfaction arises both on the part of health professionals themselves and health service users. This situation is evidenced in several studies carried out with Australian, Swedish and Norwegian midwives, in which it is concluded that the prevalence of work exhaustion or burnout felt by these people is 57%, 39.5% and 20%, respectively⁽¹⁶⁻¹⁷⁾. At the end of 2017, the relationship between burnout and midwives' workloads was studied, showing a positive association, as 42.6% of consulted midwives consider that the proportions of midwives are not adequate for the volume of work they perform⁽¹⁸⁾.

Moreover, science(19-20) states that midwives' emotional wellbeing has considerable implications for safe maternity care as well as women's satisfaction. The results of these studies agree with others that claim that work overload, staff shortages, and the factors inherent to the institution management, are reflected in the professional work, adopting mechanized, repetitive and strictly bureaucratic actions, without meeting each patient's individual characteristics⁽⁷⁾. In addition to this, scientific evidence determines the existence of an association between the density of health professionals and rates of maternal mortality, infant mortality and immunization rates, since the prediction of the number necessary to meet users' needs has not been an easy task(17). However, maternity hospitals do not have the same number of staff 24 hours a day, not every day of the year, having shown that at times when there are fewer staff, the risk of perinatal death increases by 45%(18).

In the field of childbirth care, the real time that midwives dedicate to the mother-child care during the birth process, activity times are estimated at around 60 minutes, values that coincide with essential care, established in the WHO model recommendations (Respectful care during childbirth and birth; Emotional support from a companion of their choice; Effective team communication; Pain relief strategies; Regular labor surveillance, event documentation, audit and feedback; Liquid and food intake; Mobility in labor and position of choice during childbirth;

Pre-established reference plan; Continuity of care)⁽¹⁵⁾. This can be confirmed in the study by Tabatabaee and Daghighbin (2020)⁽²¹⁻²³⁾.

But we found 25 interventions in which their time has been shorter, not because they are less important, but because of infrastructure deficiencies, such as midwives' lack of time to dedicate individually to that NIC intervention. When comparing the actual times in the performance of NIC interventions by midwives in the childbirth unit with those agreed by the NIC group, we found important differences. The times dictated by the NIC are established by consensus among a group of midwives, without taking into account unforeseen events or deviations from normal birth, while the measured times are real, as they were determined in a childbirth unit, taking into account all the peculiarities of direct and indirect assistance that may occur.

When analyzing the comparison of the execution times of the NIC interventions, by the sample of midwives of the field study, with those agreed with the NIC, we found discrepancies, due to the method of obtaining the data. The maximum measured time, 60 minutes, is for childbirth-related interventions (electronic fetal monitoring: before and during labor, labor induction, team supervision: quality management; development of a clinical pathway, development of a program and quality control, administration of blood products, suppression of contractions and handling of operating room instruments).

We are faced with the lack of similar studies and investigations that allow comparison with our study. Although we found studies of this type, but in other units and with other types of patients. In this sense, future lines of research should focus on the generation or adaptation of a validated tool that allows quantifying the work performed by this professional profile.

Study limitations

The average times in this work reflect midwives' workload in a specific care setting, in a specific healthcare organization, and during an observation time limited to the study period.

Contributions to nursing, health, and public policies

This research contributes to the knowledge of the components that generate midwives' workload, improves human resource management and the personnel planning necessary to meet the demand for care for parturient women, always in accordance with the real demands of care.

CONCLUSIONS

Midwives present a continuous overload during their care activity. During a shift, 96 nursing interventions can be identified in each childbirth. Measuring them allows them to visualize the work on each deliverable individually. The times obtained in 25 of interventions are always much lower than those proposed by the NIC working group, since the consensus is ignored and the real time is quantified.

This translates into an overload that affects mother-child care during the birth process and the mental health of professionals. Therefore, they consider it essential to actually measure their workloads, using an instrument that quantifies the time they dedicate to carrying out each of the activities, and not the number of daily births attended at the unit, as this type of work is currently management is insufficient.

The theoretical support of this study is based on the interrelationship between the childbirth care model, the nursing care process performed by midwives and the international classification of interventions that they use to highlight all the work performed. For this reason, it is considered essential to quantify the workload to which midwives are exposed to help in the real quantification of the care burden and the number of midwives that must compose the multidisciplinary teams.

ACKNOWLEDGEMENTS

We thank all the midwives who participated in this study, giving part of their time at the service of science, in addition to publicly recognizing the facilities offered by both the management and HCUVA professionals (Murcia, Spain). Also, I cannot forget my fellow researchers without them, none of this would be possible.

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