AMJ Australasian Medical Journal [AMJ 2016;9(8):255–261]

Attitudes toward the use of baby walkers among healthcare personnel

Mazen Alessa, Majeda Hammoud, and Wafa Al-Qabandi

Department of Pediatrics, Faculty of Medicine, Kuwait University, Kuwait

RESEARCH

Please cite this paper as: Alessa M, Hammoud M, Al-Qabandi W. Attitudes toward the use of baby walkers among healthcare personnel. AMJ 2016;9(8):255–261. http://doi.org/10.21767/AMJ.2016.2650

Corresponding Author:
Mazen Alessa
Department of Paediatrics, Faculty of Medicine, Kuwait University
P.O. Box 24923, Safat 13110 – Kuwait
Email: mazen@hsc.edu.kw

ABSTRACT

Background
Baby walkers (BW) are commonly used among the population in Kuwait with high incidence of injuries and without awareness of their harms.

Aims
The aim of the study is to identify the attitudes of healthcare personnel in Kuwait towards the use of BW.

Methods
Self-administered questionnaires were distributed among 144 health workers of different specialties in hospitals in the State of Kuwait to find out the perceived benefits and associated risks of BWs.

Results
108 participants had children and 36 did not. Of those, who had children, 87 (80.6 per cent) have used a BW. The most common reasons for using a BW were: to promote early walking (60.9 per cent), to give the child freedom (44.8 per cent), and to keep the child safe (43.7 per cent) and entertained (43.7 per cent). 20 participants reported injuries sustained from the BW (23.0 per cent). The majority of participants (52.8 per cent), mostly paediatricians and physiotherapists acknowledged the risks of BWs, but most participants also believed that BWs increase a child's motor activity levels (64.6 per cent).

Conclusion
Healthcare personnel commonly think highly of BWs and believe that it benefits the child.

Key Words
Baby walker, health care personnel, child development, injuries

What this study adds:

1. What is known about this subject?
What is known about this subject is the population attitude of the use of baby walkers that they promote the motor development of the babies.

2. What new information is offered in this study?
This study shows the rate of use, rate of injury and the attitude towards the use of BW among health workers.

3. What are the implications for research, policy, or practice?
There is a need for more of health education among the population including the health workers about the use of BW which needs further research.

Background

Baby Walkers (BWs) are believed to have been invented in the 17th century and even now they are still commonly used worldwide and represent a preventable cause of injury in children.[1–3] It has been reported that its use ranges from 42 per cent to 92 per cent in some populations, with the age of use as early as 4 months in some cases.[3]

Many reasons have been identified as to why parents still use baby walkers. The most common misconception is that using a BW promotes early walking in children.[1–4] Other reasons for using a baby walker include keeping the child occupied and entertained; many parents also believe that using a BW increases their child's leg muscle strength.[1,2,4,5]

However the general consensus is that these perceived benefits do not outweigh the risks associated with using a BW. The associated injury has been shown to range from as low as 7.8 per cent in some studies to 94 per cent in others.[4] The injuries most commonly result from falling down stairs, although burns and poisonings have also been associated with BW use.[1,3,4,5] BW have also been the cause of death and life threatening situations in some cases.[1,4] Additionally some researchers have shown that baby walkers can potentially delay a child's achievement of motor milestones such as crawling standing and walking.[6] In 2001 the American Academy of Paediatrics recommended a ban on the manufacture and sale of mobile baby walkers.[7] Taking it a step further, Canada has even gone as far as to ban the import, advertising and sale of BWs.[4,8,9] In spite of all this BWs are still popular in the Middle East.[2–4] In a published study previously conducted, it was shown that 95.3 per cent of parents living in Kuwait have used or are currently using a BW; additionally 28.9 per cent have reported injuries while using a BW.[10] The aim of this study is to discover the attitudes of health care personnel in Kuwait towards BWs as well as their personal experiences with BW and their associated injuries.

Method

Self-administered questionnaires were distributed to hospitals spanning the 6 provinces of the State of Kuwait. Within the hospitals, the questionnaires were given to medical doctors, nurses and physiotherapists.

The questionnaire consisted of 5 sections. The first section contained questions related to demographics and included age, sex, marital status, number of children, specialty and work rank. The second section detailed the participants' personal use of BWs and included past experience with BWs, as well as reasons for use, frequency of use and duration of use. The third section included details regarding motor development in children who use BWs, including comparison of motor development in siblings and skipped motor behaviours. The fourth section detailed injuries caused by BWs and includes type of injury, cause of injury and result of injury. The final section of the questionnaire evaluated the participants' perception of BWs and included both potential benefits and potential risks, as well as whether or not the participant would recommend baby walkers to others. Participants who did not have children were only required to complete the first and last sections of the questionnaire.

The data was analysed used version 22.0 of the SPSS software.

Results

144 participants completed the questionnaire, 108 of which had children, and 36 of which were either single or did not have any children. Details of the participants' profession and specialty are shown in Table 1.

Personal baby walker use

Of the 108 participants with children, 87 (80.6 per cent) are currently using or have previously used a BW; for 21 of these participants (24.1 per cent) this was their first time using a BW. 70 of the 87 patients also reported the earliest age of their child when they started using a BW, and this ranged from 4 to 18 months of age with a mean age of 8.73 months (sd=2.565). 21 participants with children have never used a BW (19.4 per cent).

The reasons for using a BW are shown in Figure 1.
The duration of use (per day) and frequency of use (per week) are shown in Tables 2 and 3 respectively.

Motor development

The motor behaviours that were skipped in each participant's child with the earliest and greatest time spent in a BW are shown in Figure 2. This section was completed by 83 of the 87 participants who used BWs.

Injuries sustained from baby walkers

20 participants reported having at least one child sustaining an injury from a baby walker (23.0 per cent). Of these participants 7 reported falls from a height (35.0 per cent), 8 reported finger entrapment between surfaces (40.0 per cent), 4 reported burns from direct contact with hot objects (20.0 per cent), 5 reported objects falling on the child's head (25.0 per cent), 2 reported cuts or lacerations due to the child reaching for a sharp object (10.0 per cent) and 2 reported fractures of any kind (10.0 per cent).

Each participant also reported the cause of the injury which were, pushed by an adult or another child trying to encourage walking in 3 cases (15.0 per cent), trying to entertain the baby in 3 cases (15.0 per cent), wheel separation in 1 case (5.0 per cent), tripping over the carpet in 8 cases (40.0 per cent), the seat breaking in 1 case (5.0 per cent) and the baby walker collapsing in 4 cases (20.0 per cent).

When asked about the type of injury 3 participants reported head trauma (15.0 per cent), 12 reported bruises (60.0 per cent), 1 reported cut lips (5.0 per cent), 2 reported broken teeth (10.0 per cent), 6 reported a skin abrasion (30.0 per cent), and 1 reported a serious injury (5.0 per cent).

8 injuries required medical attention; 1 of the injuries warranted a visited to the emergency room (5.0 per cent), whereas 2 required a hospital admission (10.0 per cent). Additionally 4 of the injuries required a cut to be sutured (20.0 per cent) and 1 injury required a surgical operation (5.0 per cent).

Perception of the baby walker

The participants' perceived benefits and risks of using a baby walker are shown in Figures 3 and 4 respectively. A comparison of the responses from different participant specialties is shown in Figures 5 and 6. Eighty eight participants said that they would recommend BWs to others (61.1 per cent), whereas 54 participants said they would not (37.5 per cent); 2 participants did not answer this question.

Discussion

This was the first study about the attitude of use of baby walkers among the health personnel. It showed the increased popularity of the device among health workers. This is because of easy accessibility to the device, the belief of its benefit in promoting the child's motor development and the lack of awareness of possible injuries that can be sustained from its use. The rate of injuries among our sample was around 23 per cent and it is similar to many studies among general population although one study from Iraq showed very high rate of 94 per cent and that from Turkey showed very low rate of 7.8 per cent while in a study from Dublin the rate was 12.6 per cent.[1,3,4] The types of injuries included fall from the baby walker, fall from height, fingers stuck between surfaces, burn and scald burn. In addition, some children were poisoned by swallowing chemicals and some had objects fallen on them while others had cuts after reaching for a sharp object.

The American Academy of Paediatrics recommended a ban on the manufacture and sale of mobile baby walkers, while in a step further, Canada has even gone as far as to ban the import, advertising and sale of BWs.[4,7–9]

Most of the health care parents in our study were confident about the benefits of the baby walker to enhance the motor development of their babies while the results showed that large percentage skipped major gross motor skills like sitting unsupported, crawling and cruising. However, paediatricians and physiotherapists were the most aware workers of the dangers of the BWs to cause injuries as well as not promoting the motor development of the babies. A study by M Garrett showed in fact that the baby walker delayed the gross motor development in the babies.[5]

The parents gave many different reasons for using them most of them were related to the baby including to keep the baby entertained, occupied, easy to be fed, and the belief that it keeps the baby safe and promotes development. The use also became a tradition and recommended by parents.

The limitation of our study is mainly the small sample size and not including other disciplines of the health care like the general practitioners and the family doctors.

Conclusion

In conclusion, our study showed the wide use of the baby walker among children of the health personnel with a considerable risk of injuries. However, the belief of the walker to promote the child's development is running common among the health workers, although this belief is less common among the paediatrician and the physiotherapist. Therefore, proper education and issuing a strong recommendation of abandoning its use are to be implemented among the general population and the health care workers.

References

1. Shields B. Success in the Prevention of Infant Walker-Related Injuries: An Analysis of National Data, 1990-2001. Pediatrics. 2006;117(3):e452–e459.
2. Al-Nouri L, Al-Isami S. Baby walker injuries. Ann Trop Paediatr. 2006;26(1):67–71.
3. Shiva F, Ghtbi F, Yavari SF. The use of baby walkers in Iranian infants. Singapore Med J 2010;51(8):645–649.
4. Dogan D, Bilici M, Yilmaz A, et al. Baby walkers: a perspective from Turkey. Acta Paediatr. 2009;98(10):1656–1660.
5. Laffoy M, Fitzpatrick P, Jordan M, et al. Attitudes to and use of baby walkers in Dublin. Inj Prev. 1995;1(2):109–111.
6. Garrett M. Locomotor milestones and baby walkers: cross sectional study. BMJ. 2002;324(7352):1494–1494.
7. American Academy of Pediatrics, Committee on Injury and Poison Prevention. Injuries Associated With Infant Walkers. Pediatrics. 2001;108(3):790–792.
8. LeBlanc J, Pless I, King W, et al. Home safety measures and the risk of unintentional injury among young children: a multicenter case-control study. Can Med Assoc J. 2006;175(8):883–887.
9. Grivna M, Barss P, Al-Hanaee A, et al. Baby walker injury awareness among grade-12 girls in a high-prevalence Arab country in the Middle East. Asia-Pacific journal of public health. 2015 Mar 1;27(2):NP1507–NP1516.

10. Alessa M, Humoud M, Al Qabandi W. Parental Attitudes toward the Use of Baby Walkers. International Journal of Health Sciences. 2015 Dec;3(4):109–113.

PEER REVIEW

Not commissioned. Externally peer reviewed.

CONFLICTS OF INTEREST

The authors declare that they have no competing interests.

ETHICS COMMITTEE APPROVAL

Joint Committee for the Projection of Human Subjects in Research of the Health Science Centre & Kuwait Institute for Medical Specialization (KIMS), Reference: VDR/JC/570.

Table 1: Participants' profession/specialty

	Married with children	Single or no children	Total
Nurse	17	3	20
Physiotherapist	13	5	18
Internist	18	7	25
Surgeon	10	10	20
Paediatrician	20	4	24
Obstetrician	21	6	27
Others	9	1	10
Total	108	36	144

Figure 1: Reasons for using a baby walker

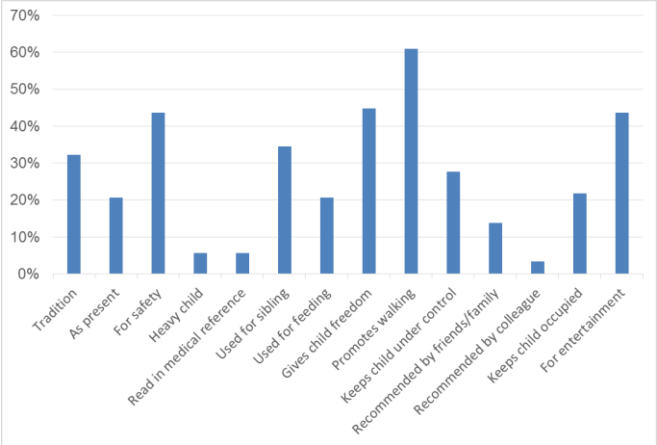

Table 2: Hours spent per day in baby walker

	Frequency	Percentage
Less than 1 hour daily	16	18.6
1-2 hours daily	36	41.9
2-4 hours daily	24	27.9
More than 4 hours daily	10	11.6

Table 3: Days per week with baby walker use

	Frequency	Percentage
Daily	58	66.7
Every other day	18	20.7
1-2 days per week	3	3.4
Occasionally per week	8	9.2

Figure 2: Motor behaviours that were skipped among children of BW users

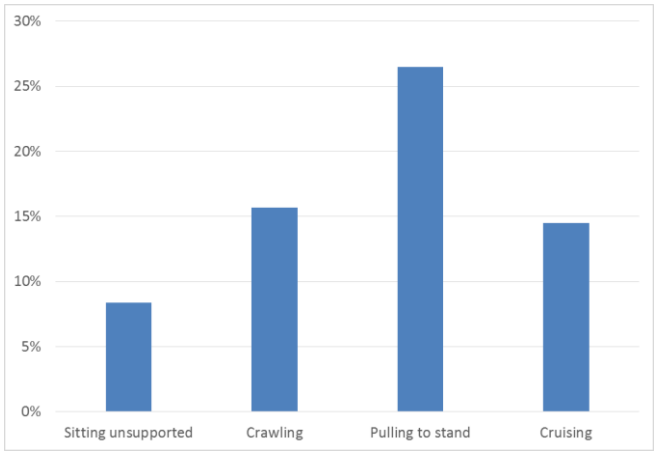

Figure 3: Perceived benefits of using a BW

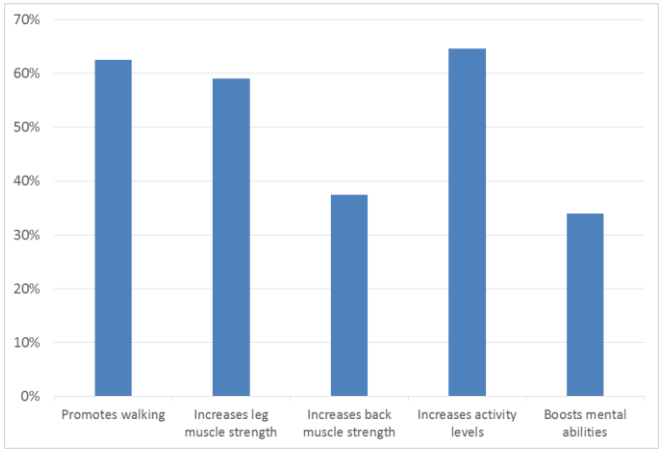

Figure 4: Perceived risks of using a BW

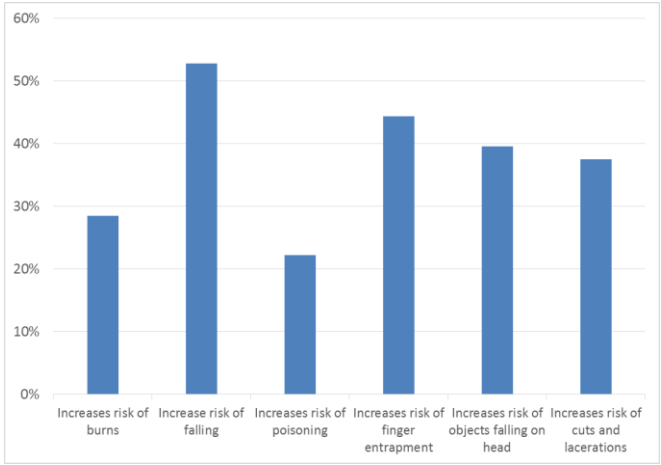

Figure 5: Comparison of responses to questions regarding perception of benefits of the BW between the different specialties

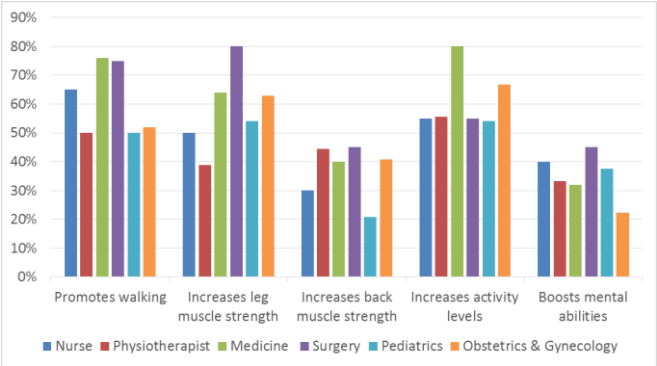

Figure 6: Comparison of responses to questions regarding perception of risks of using a BW between the different specialties