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Quality of life among auditory handicapped male school children in Riyadh City.

The concept of Quality of Life (QOL) has been developed over many decades and applied to a wide range of target groups and whole populations. Its influences can be seen in legislation, policies and programs that aim to improve the lives, personal satisfaction, success, community membership and participation and evaluate services for people's disabilities.

A descriptive cross-sectional study was conducted in special education schools and institutions for auditory handicapped male school children in Riyadh City. The data was collected from all enrolled intermediate and secondary auditory handicapped male school children (n = 363) using the World Health Organization's Quality of Life (QOL)-bref(WHOQOL-BREF) which inquires on data in four major QOL domains.

The study showed a significant negative correlation of physical health with birth order and a significant positive correlation with mothers' education (-0.117 and 0.161, respectively). Significant correlation existed between psychological domain with birth order and number of siblings (-0.158 and -0.142, respectively). There were significant positive correlation between social relationship and environment with father's and mother's education (0.193 and 0.181, respectively), (0.254 and 0.168, respectively). Also, there was a significant negative correlation of the environment

with the number of siblings (-0.167). Table 1 demonstrates the correlations between QOL domains, age, birth order, and number of siblings of studied school children and parents education.

Among all domains, the social relationship domain was the highest affected by living with parents with a mean score of 76.0, Standard Deviation (SD) of ± 19.5 and p-value = 0.001, followed by the mean score of the environmental domain 64.0 (SD ± 19.9) and p-value = 0.028. The mean score of social relationship and environment domains were higher among those who lived with families caring for only one handicapped individual, the student himself (78.0 ± 17.6 and 66.2 ± 19.0 ,

respectively), p-values = 0.004 and 0.006, respectively. Almost two thirds of the studied school children rated their lives either as good or very good (67.9%). The majority of the students were very satisfied or satisfied with their lives (77.2%).

- Reported by: Dr. Rashed M. Al Somaily, Dr. Ibrahim Kabbash (Field Epidemiology Training Program)

Editorial Notes: The majority of the studied school children were living in their families own houses, which shows that the families of those students have a better financial standing, which would be reflected indirectly on their lives. Also, living in an owned house is likely to be a constant place of residence, which creates a better environment and fosters both social and cultural relationships for the handicapped in particular. Being forced to shift from one rented house to another requires adaptation and places a burden

Table 1: Correlation between quality of life domains, age, birth order, and number of siblings of studied school children and parents education

Variables	Physical health		Psychological		Social relationship		Environment	
	r	p	r	p	r	p	r	p
Age in years	-0.069	0.226	-0.062	0.282	-0.055	0.341	-0.070	0.219
Birth order	-0.117	0.045	-0.158	0.007	-0.003	0.954	-0.080	0.172
Number of siblings	-0.033	0.566	-0.142	0.013	-0.074	0.199	-0.167	0.003
Fathers' education	0.096	0.100	0.110	0.060	0.193	0.001	0.168	0.004
Mothers' education	0.161	0.006	0.084	0.154	0.188	0.001	0.254	<0.01

on a normal person and more on the disabled.

This study showed a significant negative relationship between the domain of physical health of the auditory handicapped school children and birth order. This means that the physical health of the auditory handicapped school children will be worse with a higher number of siblings. Most studies that have focused on the effect of disabled children on their siblings reported that normal children were more negatively impacted by their disabled siblings, such that 74.1% reported suffering from the negative impact of having a disabled sibling.¹

An educated mother would be better equipped to understand her child's special needs and will be more committed to meet those needs. It was recognized in this study, that education of the parents especially mothers positively influences children's health, which is in agreement with previous studies.²

Birth order and number of siblings had a negative impact on the psychology of the auditory disabled students rather than normal siblings. This may result from parents dealing with the disabled child as they would his normal siblings. In an older study the same impact was reported among normal siblings rather than disabled.³

Parents' education had a positive impact on the social relationship and environment of the studied students and this is due to the open mindedness and full understanding of educated parents of their disabled child's needs in general, which has also been reported in previous studies.²

Fathers' occupations were found to significantly affect the safe environment of studied school children in a positive direction. This can partly be explained by the significant impact of both income and expenditure which allows a disabled child to live in a good and safe environment. It has been estimated that families with disabled children need incomes 10–18% higher than those with non-disabled children, if they are to achieve the same standard of living. Simultaneously, however, the demands of caring may reduce the options available to the parents, particularly the father, to bring in income.

Friendship and work relationships of the employed educated mothers of disabled children are reflected as good social relationship and environment for the disabled child. Friends from the workplace visiting the mother may indirectly provide assistance to her disabled child in a social way. A previous study showed

that mothers with disabled children had a higher strain level and received inadequate social support.⁴

The recent study showed that all QOL domains for the studied school children were affected significantly by living accommodation. Generally the mean scores of children's quality of life domains were higher among those who lived with parents, with highest effect on social relationship domain, followed by the environmental, psychological and physical health domains. Self-esteem and happiness start when parents meet the needs of their children and when they build on strengths instead of trying to fix perceived flaws in the child, which can greatly improve QOL.⁵

The presence of another handicapped person in the family was also found to significantly affect the social relationship and environment of the studied school children but not the other domains. The mean score of social relationship and environment domains were higher among those who lived with families caring for only one handicapped person, the student himself. The presence of another handicapped person in the family will increase the demand on the family, and unmet needs will result in poorer QOL.⁶

Concerning self perception of QOL and self reported satisfaction, almost two thirds of the studied school children rated their lives as either good or very good (67.9%). The majority were very satisfied or satisfied with their life (77.2%). Only (8.7%) were dissatisfied or very dissatisfied with their life. This is the opposite of what was recognized in studies for children having other types of disabilities such as intellectual disability, for example.⁷

Special education programs for non educated parents should improve the QOL, especially social relationships and environment of their disabled children. Families caring for more than one handicapped child require assistance to attain a better QOL for their handicapped children, and should be offered more effective financial support programs from the concerned authorities. Disabled children not living with parents need special care. Further studies regarding other types of disabilities would be helpful for better understanding of handicapped children's QOL.

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بالنسبة للمجال البيئي ومجال العلاقات الاجتماعية أعلى للطلاب الذين لا يوجد بين أفراد عائلاتهم شخص آخر معاق (متوسط القيمة 78.0 ± 17.6 و 62.2 ± 19.0 على التوالي) (قيمة مرجحة $0.006 = 0.004$ على التوالي). كما أظهرت الدراسة أن أكثر من ثلثي الطلاب الذين أجريت عليهم الدراسة يصنفون مستوى معيشتهم من جيد إلى جيد جداً (67.9%) بينما غالبيتهم أجاب بأنه راض أو راض جداً عن حياته (77.2%).

تمت التوصية على استحداث برامج تعليمية خاصة للأباء غير المتعلمين والأمهات غير المتعلمات حتى تتحسن جودة الحياة لأطفالهم المعاقين، خاصة في جانب العلاقات الاجتماعية والجانب . كما يتوجب على الوالدين توفير بيئة أكثر أماناً للطفل المعاق كلما كان عدد أفراد الأسرة أكثر . يجب توفير الدعم بمختلف أشكاله للأسر التي ترعى أكثر من طفل معاق وعلى الجهات المعنية توفير برامج أكثر فعالية لتقديم الدعم المادي لهم ويحتاج الأطفال المعوقين الذين لا يعيشون مع والديهم إلى رعاية مكثفة تضمن لهم حياة عالية الجودة.

إعداد: د. راشد بن محمد صميلي، د. إبراهيم بن علي كباش (برنامج الوبائيات الحقلية).

جودة الحياة للطلاب المعاقين سمعياً بمدارس مدينة الرياض

■ عرفت منظمة الصحة العالمية مصطلح جودة المعيشة في عام ١٩٩٣ بأنه «إدراك الفرد لمكانته في الحياة بناء على ثقافته وقيمه التي يتعايش معها وفقاً لأهدافه، وتطلعاته، ومعايير، واهتماماته».

وقد جرى تطوير مفهوم جودة المعيشة على مدى عقود عديدة ، وتطبيقه على عدد كبير من الفئات المستهدفة. هدفت هذه الدراسة إلى تقديم وصف كمي للجوانب المتعلقة بجودة المعيشة للطلاب المعاقين سمعياً بمدارس ومعاهد مدينة الرياض ، تحديد العوامل المؤثرة على مستوى جودة المعيشة لهؤلاء الطلاب، من أجل تقديم توصيات لتحسين مستوى جودة المعيشة لهذه الفئة أو تسليط الضوء على مشاكلهم.

أجريت دراسة ميدانية وصفية مستعرضة استهدفت الطلاب المعاقين سمعياً المنتظمين في برامج ضعاف السمع الملحقة بمدارس التعليم العام وطلاب معاهد العوق السمعى (معاهد الأمل) للمرحلتين المتوسطة والثانوية بمدينة الرياض. بلغ حجم العينة ٣٦٣ يمثل جميع الطلاب المعاقين سمعياً المنتظمين في البرامج والمعاهد المذكورة . وقد جمعت البيانات المطلوبة منهم بواسطة استبيان منظمة الصحة العالمية لجودة المعيشة - النموذج المختصر (WHOQOL-BREF). ويحتوي هذا الاستبيان على البيانات

أظهرت الدراسة أن ترتيب الطفل المعاق بين أشقائه يؤثر تأثيراً سلبياً على صحته البدنية في حين أن مستوى تعليم الأم يؤثر بشكل إيجابي على الصحة البدنية (-٠,١١٧ و ٠,١٦١، على التوالي). كما أظهرت الدراسة ارتباطاً وثيقاً بين المجال النفسي من ناحية وترتيب الطفل المعاق بين أشقائه وكذلك عدد الأشقاء من ناحية أخرى (-٠,١٥٨ و ٠,١٤٢، على التوالي). كما أثبتت الدراسة وجود علاقة ارتباط إيجابي كبير بين المجالين الاجتماعي والبيئي من جهة ومستوى تعليم كل من الأب والأم من جهة أخرى (٠,١٩٣ و ٠,١٨١، على التوالي)، (٠,٢٥٤ و ٠,١٦٨، على التوالي). وقد أظهرت الدراسة أن عدد الأشقاء يؤثر تأثيراً سلبياً كبيراً على البعد البيئي في حياة الطفل المعاق (-٠,١٦٧).

من بين جميع مجالات جودة المعيشة وجد أن مجال العلاقات الاجتماعية هو الأكثر تأثراً بالعيش مع الوالدين (متوسط القيمة = $٧٦,٠ \pm ١٩,٥$) (قيمة مرجحة = ٠,٠٠١) يليه في ذلك المجال البيئي (متوسط القيمة = $٦٤,٠ \pm ١٩,٩$) (قيمة مرجحة = ٠,٠٢٨). أظهرت الدراسة أيضاً أن متوسط مستوى جودة المعيشة

أعمار الطلاب المستهدفين تراوحت بين ١٢-٢٧ سنة (متوسط ١٧,٢ الانحراف المعياري $\pm ٢,٥٧$)، من بينهم نسبة ٦٧٪ كانت أعمارهم أكثر من أو مساوية ١٦ سنة . وقد توزعت عينة الدراسة بالتساوي تقريباً فيما يتعلق بالمرحلة الدراسية حيث مثل طلاب المرحلة المتوسطة ٥٢,٦ ٪، والثانوية ٤٧,٤ ٪ . كانت الغالبية العظمى ممن (١,٦٣ ٪) يمتلكون منزلاً خاصاً، وتنتمي الغالبية العظمى منهم لأسر كبيرة الحجم يصل عدد الإخوة والأخوات فيها إلى ستة أو أكثر (٨,٧٤ ٪)، كما وأن معظمهم يعيش مع والديه (٩,٨٥ ٪). بلغت نسبة العائلات التي فيها أكثر من طفل معاق (٩,٣٦ ٪). مستوى تعليم غالبية الآباء إما جامعي أو ثانوي (٧,٥٧ ٪) ويعمل غالبيتهم في مهنة احترافية (٦,٤٢ ٪). بلغت نسبة الأمهات الأميات (٤,٢٢ ٪) وكانت غالبيتهم ربات منزل (٩,٦٢ ٪) .

Effect of acute episodes of sickle cell disease on the Personal and Family Life of Saudi children suffering from sickle cell disease, Al-Ahsa Region, 2011.

The symptoms of acute episodes of sickle cell disease (SCD) have a significant effect on childhood activities, schooling, dietary practices, in addition to the financial burden on the family. This study was conducted to assess the socio-clinical profile of Saudi children suffering from SCD, and the effect of their SCD symptoms on their and their mothers' life. A cross-sectional descriptive study was conducted in Saudi children, 1-12 years of age, suffering from SCD, and who follow-up at the hematologic outpatient clinics of four major hospitals in Al-Ahsa region. A stratified random sampling technique was used to recruit the children, while each hospital was allocated sample proportionate to the total number of registered cases of SCD in each hospital. Some of the descriptive findings of the study are presented here.

In the study 305 children participated, among whom 54.8% were males. Mean age was 7.6 years (SD ± 3.4 years), 64.9% were students and preschool children constituted 35.1%. At the time of initial diagnosis, 63.6% of SCD patients had HbS 61% and above, 23.3% had HbS from 51-60% and only 13.0% had HbS from 40-50%. Over half (56.7%) had a positive family history of SCD. Among the fathers 4.6% had SCD and among the mothers 10.8%. Regarding siblings with SCD, 20.0% had one sibling with SCD, 19.7% had two, 4.3% had three and 4.5% four or more.

During the last 12 months, SCD patients had up to 90 attacks of pain episodes with a mean of 12.3 episodes (SD ± 15.0), while 36.4% had 11 or more pain episodes. During the same period, SCD patients had up to 50 episodes of fever with a mean of 4.4 episodes (SD ± 7.1), while 31.1% had 4 or more episodes of fever. Regarding reported

precipitating factors for the last episode of SCD, cold weather was reported by 42.3% patients, physical activities by 26.2%, emotional stress by 12.5% and dehydration by 8.9%.

Out of 305 children, 32.5% had been hospitalized for the last episode. During the last 12 months, 88.5% had visited the emergency room and 66.6% had visited outpatient clinics. During hospitalization, 79.0% had stayed with their mothers, 12.1% with sisters, 3.6% with House maids, 2.2% with fathers, 1.8% with aunts, 0.9% with Grandmothers and 0.4% with some other relative. When the mother stayed with the SCD child in hospital, a grandmother took care of other siblings of the patient in 29.0% cases.

Frequency distribution of some adverse effects on personal and school life of SCD children are shown in table 1. Mothers of 42 SCD children in our study were employed and 39 (92.9%) of

them reported frequent absence from their work as a result of their SCD child's sickness. 167 (54.8%) of SCD children's mothers usually felt restrictions on their social life and 82 (26.9%) sometimes. Less than half of the mothers 85 (27.9%) felt ignored in society as a result of the SCD of their children. Among the 109 who gave instructions to their friends and relatives about SCD child when they stayed in their house, 78 (71.6%) felt embarrassed in doing so. Out of total families, 216 (70.8%) had to buy medicines for children, of whom 122 (56.5%) felt burdened due to the cost of the child's treatment. Out of 8 families who had to buy a wheelchair for the child, 5 felt that they were financially burdened as a result of this purchase.

Reported by: Dr. Hussain A Al-Bakheet, Dr. Abdul Jamil Choudhry (Field Epidemiology Training Program)

Editorial notes: SCD is a major problem in the Kingdom of Saudi Arabia, where its prevalence is higher than any other country of the Arabian Gulf region.^{1,2} SCD is a major public health concern and patients are at risk for psychosocial adjustment problems.³

SCD in children has a substantial effect on health and quality of life. Often there are restriction of activities, interrupted sleep, disturbed routines,

increased stress, and poor school performance.⁴ Pain in SCD patients was predictive of higher stress and lower positive mood on subsequent days, resulting in over seven times increased risk of not attending school, and was highly disruptive of social and recreational activities.⁵

A 2005 study done in India revealed that SCD is likely to have an effect on the social, educational and emotional aspects of the SCD children's lives as well as considerable financial burden on families. The age of presentation was 6.9 ± 3.8 years, and 48% reported that they were limited in sports and recreation, 20% reported they felt sad, 36% were unable to participate in cultural activities, 28% only were accepted by friends, 32% reported teachers support for problems, and 52% did not go to school when developing SCD episodes.⁶

In another study carried out in the Eastern Province, Saudi Arabia, 180 SCD children were compared with 202 children without SCD, both groups had age range from 14 to 18 years. Children with SCD showed a significant educational delay in terms of excessive failing and school retention while the ones without SCD were significantly better. This delay was attributed by the parents due to excessive absenteeism from schools in response to frequent hospitalization, emergency admissions, and appointments for checkups. The study also found that SCD adversely affected

their sleep pattern and resulted in overstay in hospital. The data adds to the growing literature that suggests that certain socio-clinical factors characterize children with SCD that affect adversely their life style and suggest the need for re-activating relevant treatment modalities including health education.⁷

This study confirms the negative effect of acute episodes of SCD on the personal and family life of SCD children. Health education and raising awareness of parents and school teachers are recommended. It should be

stressed to parents to continue registering the SCD child at school. Teachers should encourage and support SCD schoolchildren. Mass media can play an important role in this respect.

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Table 1: Personal and School life of SCD children in Al-Ahsa Region, 2011G

Personal and School characteristics		Frequency	Percent
Participate in Physical activities (N=305)	Usually	117	38.4%
	Sometimes	86	28.2%
	No	102	33.4%
Feel sad due to frequent hospitalization (N=260)	Usually	133	51.2%
	Sometimes	55	21.2%
	No	72	27.6%
Spend holidays comfortably (N=305)	Usually	111	36.4%
	Sometimes	112	36.7%
	No	82	26.9%
Sleep well during episode (N=305)	Usually	15	4.9%
	Sometimes	75	24.6%
	No	215	70.5%
Needing special care (N=305)	Usually	162	53.1%
	Sometimes	93	30.5%
	No	50	16.4%
Avoid friendship (N=243)	Yes	29	11.9%
	No	214	88.1%
Offensive comments by siblings (n=285)	Yes	10	3.5%
	No	275	96.5%
Offensive comments by Schoolmates (N=126)	Yes	25	19.8%
	No	101	80.2%
Teachers deal with SCD child (N=161)	Usually	57	35.4%
	Sometimes	58	36.0%
	No	46	28.6%
School performance (N=147)	Excellent	54	36.7%
	Very good	22	15.0%
	Good	33	22.4%
	Fair	23	15.6%
Attended school during SCD episodes, if not hospitalized (N=198)	Failed	15	10.2%
	Yes	47	23.7%
Absenteeism from school (N=161)	No	151	76.3%
	None	17	10.6%
	Day 3-1	73	45.3%
	Day 4≤	71	44.1%

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والتوضيح لهم بأن الطفل المصاب بالتكسر يجب أن لا يتوقف عن الذهاب إلى المدرسة . يجب على المعلمين بالمدارس تشجيع ودعم التلاميذ المصابين بالتكسر ومساعدتهم أثناء نوبة التكسر في المدرسة وعلى وسائل الإعلام أن تلعب دورها في رفع الوعي الصحي لدى أفراد المجتمع عن تأثير التكسر على الأطفال وأسلوب حياتهم .

إعداد: د. حسين البخيت ،
د. عبدالجamil شوري (برنامج الباثيات الحقلية).

تقييم مدي تأثير أعراض تكسر الدم المنجلي الحادة على أنماط الحياة المختلفة لدى الأطفال السعوديين المصابين بتكسر الدم المنجلي في مستشفيات من وزارة الصحة بمنطقة الأحساء في المملكة العربية السعودية لعام ١٤٣٢ هـ

■ تكسر الدم المنجلي هو أحد أنواع فقر الدم الانحلالي الذي يصيب كريات الدم الحمراء و سبب حدوث هذا المرض هو حدوث خلل وراثي أثناء اصطناع الهيموغلوبين . ويعتبر هذا المرض من أشهر أمراض الدم الوراثية الانحلالية التي تسبب تكسر كريات الدم الحمراء و ينتشر في عدة دول أفريقية واسيوية وهو تقريباً موجود في جميع الدول العربية. أما في بعض مناطق من الخليج العربي (كمطقة الأحساء والقطيف وجزان في السعودية) فيحمل كل ٤ أفراد من بين ٢٠ فرد هذا المرض ، أي نسبة حاملي صفة المرض حوالي ٢٠٪ . ويشكل تكسر الدم المنجلي السبب الرئيس للمرض المزمن في مرحلة الطفولة وفي جميع مراحل العمر وهو مسؤول عن نسبة هامة من أيام الغياب عن المدرسة كما يمكن أن يؤدي إلى اضطرابات نفسية ومادية واجتماعية في الأسرة المصابة .

المرض . وقد تم إجراء الدراسة عن طريق مقابلة أمهات الأطفال المرضى خلال مراجعتهم لعيادة الدم .

من بين الأطفال البالغ عددهم ٣٠٥ ، كان ٦٤,٩٪ من الطلاب . أكدت هذه الدراسة تأثير تكسر الدم المنجلي على الأطفال المصابون بالتكسر من حيث نشاطاتهم اليومية، مستواهم التحصيلي في المدارس ونسبة حضورهم للمدرسة ، كما يمتد هذا التأثير على حياة أمهاتهم وعائلاتهم . وجدت الدراسة ان ٢٦,٩٪ من الأطفال المصابين بالتكسر لا يستمتعون بالعطلة خارج المنزل، ٧٠,٥٪ لا يستمتعون بالنوم الهادئ أثناء نوبة التكسر ، ٨١,٧٪ من أمهات الأطفال يعانون من القيود الاجتماعية على حياتهم بسبب مرض أطفالهم ، و ٩٢,٩٪ من الأمهات الموظفات سجلن نسبة غياب مكرر من أعمالهن لنفس السبب .

تمت التوصية على العمل على زيادة مستوى الوعي لدى الوالدين

تهدف هذه الدراسة إلى وصف الملامح الاجتماعية والديمغرافية، الأعراض، الحياة الشخصية والعائلية للأطفال السعوديين الذين يعانون من مرض تكسر الدم المنجلي في منطقة الأحساء وتقييم تأثير نوبات الأعراض الحادة لتكسر الدم المنجلي على الحياة الشخصية والعائلية لهؤلاء الأطفال وتقديم التوصية التي تستند إلى الأدلة من أجل تحسين حياة هؤلاء الأطفال وأسرهم .

قام فريق من برنامج الباثيات الحقلية بدراسة مقطعية تم فيها اخذ عينة عشوائية مكونة من ٣٠٥ طفلاً سعودياً مصاباً بتكسر الدم المنجلي. وقد تم تعبئة استبيان مكون من ثلاثة أجزاء ، حيث يغطي الجزء الأول تحديد البيانات والمعلومات الاجتماعية والديموغرافية و يتناول الجزء الثاني الجوانب المتصلة بالمرض والجزء الثالث على أسئلة بشأن الحياة الشخصية المتعلقة بالطفل مثل الإنجاز المدرسي، والقيود والاضطرابات التي تواجههم بسبب

Head Lice infestation of girl students in a primary school, Riyadh, 2010.

Performed in different countries suggest broadly varying infestation rates.^{2,3} The principal of a primary girls school noticed an infestation of head lice in students so she requested help in investigating this outbreak. The Field Epidemiology Training Program sent a team to the school to verify the extent of the outbreak, identify the possible risk factors and to provide recommendations for disease control and prevention of its recurrence.

A case control study was conducted. A case was defined as any student in the primary school who developed one of the following symptoms, head itching, and head wound, and feeling movement in the hair. A control was defined as any student in the primary school and not infected by head lice during the same period. Self administered questionnaires were distributed to study subjects to collect information about use of common items and contact.

Out of a total of 388 students, 82 (21.1%) were infested by head lice. Due to incompleteness of questionnaires, 76 cases and 144 controls where included in the study. All the studied subjects were Saudi females, with ages ranging between 7 to 11 years (mean 9.7, SD \pm 2.43). Considering the risk factors for head lice infestation, it was found that hair ribbons were shared by 77.6% of cases compared to 12.5 % of controls, and this difference was statistically significant (OR=24.2, 95% CI 11.1 - 54.4). Scarves were also shared more among cases (77.6%) than controls (13.2%), attaining statistical significance (OR=22.8, 95% CI 10.5 - 50.6). Sharing hairclips was also statistically significantly associated with infestation where they were shared by 82.9% of cases and only 20.8% of controls (OR=18.4, 95% CI 8.5 - 40.6). A statistically significant

difference also existed between cases and controls in sharing hair combs (OR=7.5, 95% CI 3.9-14.8). (Table 1)

This outbreak of head lice in the girl's elementary school is mainly due to the sharing of accessories especially hair ribbons, hair clips and scarves.

- Reported by: Dr. Nagham K. AbdulRahman, Dr. Mohammad A. AlMazroa (Field Epidemiology Training Program).

Editorial notes: Lice are parasitic insects that can be found on people's heads (*Pediculus humanus capitis*),² and bodies (*Pediculus humanus corporis*), including the pubic area (*Phthirus pubis*).³ The head louse can also be found on the eyebrows, and eyelashes.^{4,5}

The head lice infestation in the girls' elementary school is mainly due to sharing accessories

especially hair ribbons, hair clips and scarves. Health education, encouraging of personal hygiene and preventing common use of accessories will be the best methods for control and prevention of head lice.

References:

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Table 1 : Comparison of cases and control with Risk factors for head lice infestation, Girls primary school, Riyadh 2010

Risk factor	Cases		Controls		OR	95% CI
	No.	%	No.	%		
Sharing Hair Combs	49	64.5	28	19.4	7.5	3.9-14.8
Sharing Scarves	59	77.6	19	13.2	22.8	10.5-50.6
Sharing Hats	14	18.4	12	8.3	2.5	1.0-6.4
Sharing Clothes	25	32.9	17	11.8	3.7	1.7-7.8
Sharing Ribbons	59	77.6	18	12.5	24.2	11.1-54.4
Sharing Towels	19	25.0	12	8.3	3.7	1.6-8.7
Sharing Hair Clips	63	82.9	30	20.8	18.4	8.5-40.6
Sleeping outside Home	38	50.0	71	49.3	1.0	0.6-1.7
Sharing Pillows	35	46.1	38	26.4	2.4	1.3-4.4

فاشية الإصابة بقمل الرأس في إحدى مدارس البنات الابتدائية - الرياض، ١٤٣٠هـ

■ تعتبر الإصابة بقمل الرأس أكثر الأمراض الطفيلية إنتشاراً بين الأطفال خصوصاً بين طالبات المدارس وتشير الدراسات التي أجريت في بلدان مختلفة إلى قيم متباينة لمعدلات إنتشاره.

الشعر حد الإعتداد الإحصائي (العامل الأرجحي = ١٨,٤ ومعامل الثقة ٣,٨ إلى ١٤,٨).

يتضح من خلال نتائج هذه الدراسة أن إنتقال العدوى بين الطالبات كان في الأساس بواسطة أشرطة الشعر والطرح وإكسسوارات الشعر.

التوصية على أهمية التوعية الصحية بالمدارس للوقاية من الإصابة بقمل الرأس وتشجيع النظافة الشخصية ومنع المشاركة في استخدام أدوات الغير كشريط الشعر والطرح والامشاط .

اعداد: د. نغم خالد عبدالرحمن،
د. محمد بن عبد العزيز المزروع
(برنامج الباثيات الحقلية)

لم تظهر عليها الأعراض السابقة. قام الفريق بتوزيع إستبانه على الحالات المصابة والضابطة لتعبئتها من قبلهم .

بلغ معدل إنتشار قمل الرأس في تلك المدرسة وفقاً لتعريف الحالة المصابة ٢١,١ ٪، وتراوح عمر الحالات المصابة من ٧ إلى ١١ سنة (متوسط ٨,٧ و إنحراف معياري +٢,٤٣) . بالنظر لعوامل الخطورة و الإصابة

بقمل الرأس فقد وجد أن أهم عوامل الخطورة هو المشاركة في أشرطة الشعر والتي بلغت (٧٧,٦ ٪) بين الحالات المصابة مقارنة ب (١٢,٥ ٪) بين الحالات الضابطة، وقد بلغ هذا الفارق حد الإعتداد الإحصائي (العامل الأرجحي = ٢٤,٢ ومعامل الثقة ١١,١ إلى ٥٤,٤)، يلي ذلك المشاركة في استخدام غطاء الشعر (الطرح) (العامل الأرجحي ٢٢,٨ ومعامل الثقة ١٠,٥-٥٠,٦) . كما بلغت أيضاً مشاركة إكسسوارات

لاحظت مديرة إحدى مدارس البنات الابتدائية بالرياض وجود إصابات بقمل الرأس عند بعض الطالبات مما دعاها لطلب المساعدة في تقصي هذه المشكلة. قام فريق من برنامج الباثيات الحقلية بزيارة المدرسة للتأكد من وجود الفاشية ومدى إنتشارها وعوامل الخطورة المصاحبة لها لإقتراح التوصيات المناسبة لمنع حدوث ذلك مستقبلاً .

قام فريق البحث بعمل دراسة ضابطة شملت ٢٢٠ طالبة منهن ٧٦ طالبة (مصابة) و ١٤٤ حالة (ضابطة) بواقع حالتين ضابطتين لكل حالة مصابة، وقد عرفت الحالة المصابة بأي طالبة في تلك المدرسة ظهرت عليها كل الأعراض التالية أو أحدها : حركة في شعر الرأس وحكة في الرأس وعدم الراحة في النوم ، تقرحات في الرأس، رؤية القمل أو ببيضه الملتصق بالشعر . تم تعريف الحالة الضابطة بأي طالبة بالمدرسة

Mark your calendar . . .

Inside the Kingdom

15-16 May 2012: 2nd Pediatric Infectious Disease Update

Venue: Auditorium - KFSh&RC (Gen. Org.) Jeddah
Contact: Telephone: (02) 6677777 ext 63516/68485
Email: jcme@kfshrc.edu.sa
<http://www.kfshrc.edu.sa>

20-22 May 2012: 6th Children Development Disabilities Conference

Venue: Park Hyatt Hotel - Jeddah
Contact: Telephone: (02) 6677777 ext 65816/68485
Email: jcme@kfshrc.edu.sa
<http://www.kfshrc.edu.sa>

Outside the Kingdom

21-27 May 2012: 12th World Congress on Environmental Health: New Technologies, Healthy Human Being and Environment

Location: Vilnius, Lithuania
Contact name: Andrius Kavaliunas, UAB Aim Group Baltic, Kestucio 59/27, Vilnius, Lithuania.
Tel. +370 5 212 00 03, Fax. +370 5 212 00 13
Organized by: International Federation of Environmental Health (IFEH); Lithuanian Union of Hygienists and Epidemiologists (LUHE)
Website: <http://www.ifeh2012.org>

6-7 June 2012: International Environment and Health Conference 2012: Environmental Health Issues : A Holistic View.

Location: Penang, Malaysia
Organized by: Universiti Sains Malaysia
Contact: Secretariat, School of Health Sciences, Universiti Sains Malaysia, 16150 Kubang Kerian, Kelantan, Malaysia.
Dr. Rapeah Suppan Tel. 609-767 7613/ 7534 / 7535, fax. 609-767 7515
ehcppsk@gmail.com
Website: <http://www.ppsk.usm.my/conference/ehc12.nsf/>

11 to 14 June 2012: CPHA 2012 Annual Conference: Public Health in Canada:

Creating and Sustaining Healthy Environments.
Location: Edmonton, Alberta, Canada
Contact name: Sarah Pettenuzzo
Website: <http://www.cpha.ca/en/conferences/conf2012/callabstracts.aspx>

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Consultant Epidemiologist, Bulletin Editor
- **Dr. Abdul Jamil Choudhry**
Consultant Epidemiologist

Selected notifiable diseases by region, Jan — Mar 2012

	Riyadh	Makkah	Jeddah	Medinah	Taif	Qassim	Eastern	Hasa	Hafr Al-Batin	Asir	Bisha	Tabuk	Hail	Al-Shamal	Jizan	Najran	Baha	Al-Jouf	Gorai	Gonfuda	TOTAL
Measles	10	15	28	22	20	0	5	0	0	14	0	1	0	0	7	0	0	0	0	0	122
Mumps	1	0	1	0	0	3	3	0	0	0	0	0	0	0	0	1	0	0	0	0	9
Rubella	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Varicella	531	320	234	438	385	328	812	299	173	551	33	12	34	55	57	150	5	77	33	35	4562
Meningitis mening.	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1
Meningitis other	40	2	0	3	0	14	1	3	1	0	0	0	1	2	0	0	0	0	0	0	67
Hepatitis B	234	2	168	121	75	77	137	5	0	97	7	28	5	22	15	4	1	0	3	15	1016
Hepatitis C	152	4	98	52	24	26	82	4	0	48	6	3	2	0	6	8	0	12	0	8	535
Hepatitis unspecified	0	0	0	1	0	0	0	0	0	20	0	0	0	0	0	0	0	0	0	0	21
Hepatitis A	19	3	7	6	1	8	12	1	0	15	0	0	0	0	1	3	0	0	2	0	78
Typhoid & paratyphoid	10	1	9	7	0	5	10	8	1	6	0	0	0	0	1	0	0	10	0	0	68
Amoebic dysentery	0	0	76	10	32	1	109	18	0	39	10	0	0	0	0	0	0	0	3	0	298
Shigellosis	5	0	2	1	0	0	0	1	0	0	0	0	0	0	1	0	0	0	0	0	10
Salmonellosis	60	1	12	4	0	1	87	11	0	5	5	0	0	0	1	5	0	4	1	3	200
Brucellosis	71	2	3	55	26	246	51	5	77	151	16	4	52	24	12	31	15	2	3	0	846
Dengue Fever	0	129	108	0	4	0	0	0	0	0	0	0	0	0	77	0	0	0	0	0	318
Khorma	0	1	2	1	0	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	6

Comparisons of selected notifiable diseases, Jan - Mar 2011 - 2012

DISEASE	Jan-Mar 2012	Jan-Mar 2011	Change %	Jan-Mar 2012	Jan-Dec 2011	DISEASE	Jan-Mar 2012	Jan-Mar 2011	Change %	Jan-Mar 2012	Jan-Dec 2011
Cholera	1	0	100	1	1	Hepatitis B	1016	1192	-15	1016	4494
Diphtheria	5	0	100	5	2	Hepatitis C	535	582	-8	535	2328
Pertussis	2	2	0	2	11	Hepatitis Others	21	24	-13	21	85
Tetanus, neonat	4	0	100	4	14	Hepatitis A	78	95	-18	78	321
Tetanus, other	2	1	100	2	12	Typhoid & Paratyphoid	68	64	6	68	292
Measles	122	130	-6	122	362	Ameobic Dysentery	298	498	-40	298	1985
Mumps	9	5	80	9	26	Shigellosis	10	22	-55	10	54
Rubella	0	0	0	0	0	Salmonellosis	200	284	-30	200	1394
Varicella	4562	4548	0	4562	19469	Brucellosis	846	1091	-22	846	3942
Meningitis Mening	1	0	100	1	6	Dengue Fever	318	260	22	318	3302
Meningitis Other	67	60	12	67	245	Al-Khorma Fever	6	19	-68	6	93

Diseases of low frequency, Jan — Mar 2012

* Yellow fever, Plaque, Poliomyelitis, Rabies, Rubella, Echinococcosis: No Cases

* Pertussis: 2 Cases (Riyadh, Eastern)

* Neonatal Tetanus: 4 Cases (Makkah 3, Jeddah 1)

* Pneumococcal Meningitis: 1 case (Qassim)

* Haemophilus influenza Meningitis: 1 case (Qassim)