Social support and the acceptance of illness among patients with a tracheostomy tube

(Wsparcie społeczne a poziom akceptacji choroby u pacjentów z założoną rurką tracheostomijną)

J Zarzycka[1 A,B,C,D], E Kobos [2 A,C,D,E,F], J Czarnecka[3 D,E], J Imiela[2 E,F]

Abstract – In chronic illness, social support is a crucial part of therapy. It mobilises the patient to fight the disease and it allows him or her to accept the new role in life which is imposed on them by illness.

Aim of the study. The aim of the study was the evaluation of the impact of social support on accepting the illness by patients with a tracheostomy tube.

Materials and methods. 50 patients with a tracheostomy tube have been covered by the study. The research material was collected using an interview questionnaire, the AIS (Acceptance of Illness Scale) and the BSSS (Berlin Social Support Scales). The results were subjected to statistical analysis using the statistical test PQStat ver. 1.4.2.324. Dependence analysis was conducted using the Spearman's rank correlation coefficient, Kruskal-Wallis and Jonckheere-Terpstra tests were used for comparison.

Results. The highest levels of social support were shown in case of perceived available support (average = 3.50) and support currently obtained (average=3.12). In total, a mean value of 2.54 points was obtained on the acceptance of illness scale. A low level of acceptance was noticed among 16 patients. Higher values on the social support scale accompanied higher values on the acceptance of illness scale ($p<0.05$).

Conclusions. Patients with a tracheostomy tube rate perceived available support and support currently obtained as the highest. Overall, these patients show a medium level of illness acceptance. Social support plays an important role in accepting illness among patients with a tracheostomy tube.

Key words **–** patient, tracheostomy tube, social support, acceptance of illness.

Streszczenie – Wstęp. W chorobie przewlekłej wsparcie społeczne stanowi istotną część terapii. Pomaga w mobilizacji chorego do walki z chorobą jak również w przystosowaniu się do nowej roli pełnionej w życiu z chorobą.

Cel pracy. Ocena wpływu wsparcia społecznego w akceptacji choroby u pacjentów z założoną rurką tracheostomijną.

Materiał i metody. Badaniami objęto 50 pacjentów z założoną rurką tracheostomijną. Do zebrania materiału badawczego wykorzystano autorski kwestionariusz ankiety, Skalę Akceptacji Choroby (AIS) oraz Berlińską Skalą Wsparcia Społecznego (BSSS). Wyniki poddano analizie statystycznej za pomocą pakietu statystycznego PQStat ver. 1.4.2.324. Zależności analizowano współczynnikiem korelacji rang Spearmana, porównywano testem Kruskala-Wallisa i testem Jonckheere-Terpstra.

Wyniki. Najwyższe wartości wsparcia społecznego w grupie pacjentów wykazano w spostrzeganym dostępnym wsparciu (śr.=3,50) oraz wsparciu aktualnie otrzymywanym (śr.=3,12). Ogółem w skali akceptacji choroby uzyskano średnią wartość punktów 2,54. Niski poziom akceptacji wykazano u 16 pacjentów. Wyższym wartościom w skali wsparcia społecznego towarzyszyły istotnie wyższe wartości w skali akceptacji choroby ($p<0,05$).

Wnioski. Pacjenci z założoną rurką tracheostomijną najwyżej oceniają spostrzegane dostępne wsparcie oraz wsparcie aktualnie otrzymywane. Pacjenci z założoną rurką tracheostomijną wykazują ogółem przeciętny poziom akceptacji choroby. Wsparcie społeczne pełni istotną rolę w akceptacji choroby u pacjentów z założoną rurką tracheostomijną. Celowe jest określanie w diagnozie stanu pacjentów poziomu wsparcia społecznego.

Słowa kluczowe – pacjent, rurka tracheostomijna, wsparcie społeczne, akceptacja choroby.

Author Affiliations:

1. Faculty of Health Sciences, Medical University of Warsaw
2. Social Nursing Department, Medical University of Warsaw
3. General Nursing Department, Medical University of Warsaw

Authors' contributions to the article:

A. The idea and the planning of the study
B. Gathering and listing data
C. The data analysis and interpretation
D. Writing the article
E. Critical review of the article
F. Final approval of the article

Correspondence to:

Ewa Kobos Ph.D., Social Nursing Department, Medical University of Warsaw, Ciołka 27 Str., PL- 01-445 Warszawa, email: kobewa@interia.pl

Accepted for publication: December 11, 2014.

I. INTRODUCTION

Tracheostomy is a medical operation in which a fistula is created between the trachea and the skin to provide an airway. The fistula may be temporary or permanent [1]. According to the data on the most frequent reasons for tracheotomy, upper respiratory tract tumours rank as the single most frequent reason for a permanent tracheostomy [1]. Epidemiological data shows that the number of patients with larynx cancer has risen dramatically in the recent years which results in the increasing number of patients living with a tracheostomy [2,3].

The limitations resulting from this type of treatment may be described as bothersome and difficult to accept: there is a visible aesthetical problem, difficulty with bathing or taking a shower, swimming, clearing the throat, and the necessity to wear a tracheostomy tube [4]. The diagnosis of a chronic disease usually triggers severe emotional stress, it hinders and disturbs the normal functioning of a person, and it also has an adverse impact on the life of his or her close ones [3]. The studies by D. Olejniczak and K. Sawicka have demonstrated that patients have difficulty communicating with others, the people in the vicinity of the patients feel uneasy about the situation, and patients cannot engage in activities which they used to enjoy [5,6].

A number of factors have an impact on the experience of illness and they either make it easier or more difficult. They may be analysed at three levels. The social level concerns the correctness of communication, the second level is the patient, his or her personal resources – maturity, experience, the support received and the material means available; the third level is the disease itself, its course and the prognosis [7]. In her theory of cognitive adaptation, S. Taylor distinguishes three stages which are believed to restore or extend the psychological functioning of the patient, which they evinced before illness: searching for the cause, reassessing the meaning of one's life, attempts to control the situation and reinforcing one's own self by positive self-assessment [7].

The notion of support is defined in literature in various ways. It may be treated as help in dealing with a given situation, as resources provided by others or as an exchange of resources [8]. Social support may be viewed from a structural and functional perspective. Structural support is described as the objectively existing and available social networks, which due to the existing links are helpful to individuals in a difficult situation [8]. Objectively existing networks of support are specified as sources of support, i.e. networks of connections between individuals and groups such as consanguinity, similar functions and social statuses as well as geographical or cultural proximity [7]. Apart from family, the circle of an individual's social network is composed of representatives of institutions, professionals and non-professional helpers who have an impact on its functioning. The sources of social support available within the existing social network may be divided into: familial, friendly, social and neighbourly [8]. The sources will also include colleagues or superiors, religious groups, societies and institutions, individuals with professional preparation to provide assistance and self-help groups [7].

Functional support is defined as a type of interaction engaged into as a result of a difficult situation by one or both participants [7]. Another take on this notion describes social support from the perspective of social interaction which is engaged into in the face of illness and is targeted at specific aims such as generating trust providing motivation to seek treatment [9,10].

The functional features of support constitute the basis of its division into: perceived and received. The support perceived is linked to the knowledge and belief of a person concerning where and from whom they may receive help, who they may rely on in a difficult situation. The support received is evaluated by the recipient as the actual type and amount of support received [8]. From various types of support, the most frequently distinguished ones are:

- emotional support, i.e. the expression of emotions providing support, comfort, showing care, acceptance, and a positive attitude towards a person;
- information support, i.e. the exchange of information which helps understand the problem or situation better; feedback on one's own effectiveness in coping with the situation and sharing one's experience with people who have similar difficulties;
- instrumental support, i.e. providing information about specific courses of action;
- in-kind support, i.e. the provision of material help and services [8].

The initial determination of the type of support is based on three main indices: support received, support perceived and the network of social security comprising

the group of people who are potentially treated as evincing helpful behaviour [10].

The influence of support on health may be very complex [7]. Social support to people affected by disease is a crucial element of treatment – it helps the ill survive the period of recovery or accept the changes in their life resulting from chronic illness. The manner of support ought to be adjusted to the patient's needs. Those who give support should help the person when necessary, but not do everything instead of them [11].

The results of studies demonstrate that receiving satisfactory support has a considerable influence on patients with cancer [12,13]. They evince a higher acceptance of various ailments and difficulties related to treatment; they recover faster and they die less frequently in case of a negative prognosis concerning the cancer diagnosed. It has also been proved that motivating the patient to face the illness by people providing support influences positively the course of treatment and increases the effectiveness of therapy [10]. Support perceived among the ill strongly correlates with adaptation to the restraints caused by illness and behaviour targeted at recovery or preventing further development of the disease [10].

Patients who receive support adjusted to their needs are better informed about their disease entity in terms of treatment and possible complications, which creates proper conditions for mobilising the internal resources necessary to come to terms with life in the role of an ill person [14].

II. MATERIAL AND METHODS

The study was conducted from October 2013 to February 2014 among patients with a tracheostomy tube. The criteria for inclusion were the patient's consent to the examination, a good mental and physical state of the patient conducive to collecting information, and the minimum period of three months from the date of fitting the tracheostomy tube.

Material

50 patients meeting the criteria for inclusion took part in the study. The study group comprised 35 men and 15 women. They were patients aged from 25 to 85. The most numerous age group were respondents aged 56-65 (22 patients). A predominant part of the group were married people (22 respondents). Most of the patients lived in cities with more than 100,000 inhabitants (20 people). 13 patients came from cities up to 50,000 inhabitants, and 12 respondents lived in the countryside. Among the respondents, 19 had acquired basic vocational education, 14 held secondary education diplomas, 11 individuals – university education diplomas, and 6 had obtained lower secondary education. 30 respondents were pensioners. The most frequent reason for having a tracheostomy tube in the study group was larynx cancer (24 patients) and post-accident conditions (10 patients). Among the respondents, 26 people had tracheotomy conducted as scheduled, whereas 24 patients were subjected to emergency tracheotomy. 4 patients had already worn the tracheostomy tube for 3 to 6 months. 14 patients had worn the tube for 7 months to 1 year and exactly the same number of patients had had the tracheostomy tube for 2 to 3 years. A period of 4 to 8 years was indicated by 11 people, and 12 to 34 years by 7 individuals. 35 patients attended regular checks and 15 patients only when necessary.

A half of the respondents (25 people) were treated pharmacologically, and 15 patients had chemotherapy. Most respondents (27 people) stayed in the hospital for diagnosis, and 13 due to a lung tumour. When it comes to the number of stays in hospital, 23 respondents indicated from 5 to 8 stays and 20 patients from 2 to 4 stays.

Methods

In order to collect the study material, the diagnostic survey method was used.

Three research tools were used:

the authors' own survey questionnaire – consisting of 14 closed-ended and open-ended questions designed to collect the patient's socio-demographic and clinical data.

the acceptance of illness scale (AIS) adapted by Z. Juczyński [15], composed of eight statements describing the consequences of a poor state of health. These consequences concern the limitations imposed by illness, the lack of self-sufficiency, the reduced self-esteem and the sense of dependence on others. The statements are replied to by specifying one's current position on the five-point scale, where 1 means "I strongly agree" and 5 is "I strongly disagree". Based on the results of the study in a given population, 3 levels of illness acceptance are specified: lower, medium, and high.

a Polish version of the Berlin Social Support Scales (BSSS) – it is composed of 6 sub-scales specifying the perceived available support, the support needed, support sought, currently given support, currently received support, and buffering protective support. The author consented to the use of 4 subscales in this study. The patient replies to the statements using the scale from 1 to 4

where 1 means a completely untrue statement and 4 a completely true one [16].

Statistical methods

The analysis of the results was conducted using the statistical package PQStat ver. 1.4.2.324 and the R package. The results of analyses have been presented in descriptive statistics tables and in correlation matrix tables as well as on charts. Relationships were analysed by estimating the Spearman's rank correlation coefficient, by implementing the Kruskal-Wallis test and the Jonckheere-Terpstra test. A probability value of $p<0.05$ was deemed significant.

III.RESULTS

Acceptance of illness scale (AIS)

Generally, the mean result on the acceptance of illness scale was 2.54 points with a standard deviation of 0.9.

Table 1. Acceptance of illness scale – descriptive statistics

Statements of the scale	Mean	SD	Min.	Med.	Max.
I have difficulty adapting to the limitations imposed by illness.	2.88	1.55	1.00	3.00	5.00
As a result of illness, I am not capable of doing what I like most.	2.50	1.52	1.00	2.00	5.00
Sometimes I feel unneeded as a result of my disease.	2.82	1.30	1.00	3.00	5.00
Health problems force me to rely on others more than I would like to.	2.22	1.38	1.00	2.00	5.00
Because of my illness, I am a burden on my family and friends.	3.04	1.68	1.00	3.00	5.00
My poor health reduces my self-esteem.	2.90	1.43	1.00	3.00	5.00
I will never be as self-sufficient as I would like to be.	2.10	1.27	1.00	2.00	5.00
I believe that the people close to me often feel uneasy about my disease.	1.86	1.31	1.00	1.00	5.00
Acceptance of illness scale – in general	2.54	0.90	1.00	2.50	4.30

The highest mean value of 3.04 was obtained for the following statement: *Because of my illness, I am a burden on my family and friends*. The lowest mean value of 1.86 was reported for the statement: *I believe that the people close to me often feel uneasy about my disease.*

Based on the mean results and standard deviations obtained in the studied group of patients, three levels of the acceptance of illness scale have been distinguished: low, medium and high.

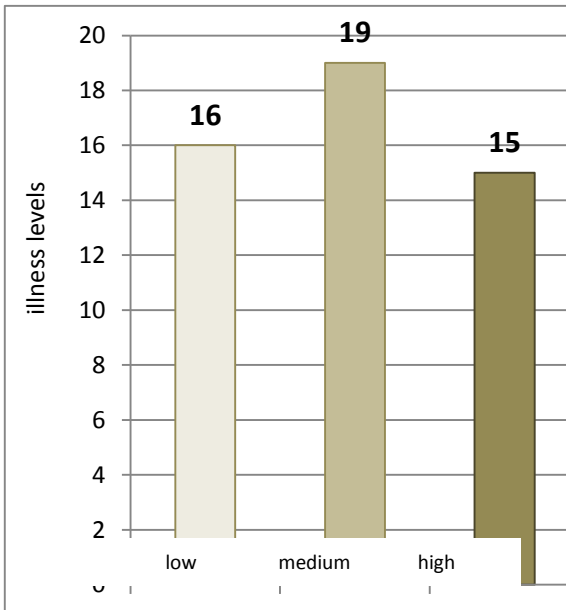

Figure 1. Acceptance of illness levels

A low level of acceptance of illness pertained to 16 patients, 19 patients evinced a medium level, whereas only 15 patients accepted their illness to a high extent.

Social support

In the subscale "perceived available support", the highest mean result was obtained for the statement: *There are people who really like me.* The mean result was 3.60.

Table 2. Statements of the BSSS scale – descriptive statistics

Statements of the scale	Mean	SD	Min.	Med.	Max.
Perceived available support					
There are people who really like me.	3.60	0.67	2.00	4.00	4.00
Whenever I feel bad, others show sympathy.	3.38	0.75	2.00	4.00	4.00
Whenever I am sad, there are people who raise my spirits.	3.48	0.74	1.00	4.00	4.00
There is always someone around to comfort me when I need it.	3.48	0.76	1.00	4.00	4.00
I know people who I can always rely on.	3.48	0.76	2.00	4.00	4.00
There is someone to help me when I am worried.	3.54	0.68	2.00	4.00	4.00
There are people to offer help when I need it.	3.44	0.76	2.00	4.00	4.00
When I can't cope with my problems, there is someone to help me.	3.56	0.71	2.00	4.00	4.00
Support needed					
When I am depressed, I need somebody to raise my spirits.	3.52	0.65	2.00	4.00	4.00
I find it important to always have somebody who will listen to me.	3.52	0.65	2.00	4.00	4.00
Before I make an important decision, I must ask someone for their opinion.	2.30	1.06	1.00	2.00	4.00
I cope best without any help.	2.10	1.10	1.00	2.00	4.00
Support sought					
In critical situations, I prefer to ask others for advice.	2.28	1.07	1.00	2.00	4.00
Whenever I am depressed, I look for somebody who will raise my spirits.	3.08	0.78	1.00	3.00	4.00
When I'm worried, I look for somebody to talk to.	3.20	0.76	1.00	3.00	4.00
When I don't know how to cope with a situation, I ask others what they would do.	2.78	1.04	1.00	3.00	4.00
I ask for help whenever I need it.	2.30	1.23	1.00	2.00	4.00
Support currently received					
That person showed me love and acceptance.	3.42	0.79	1.00	4.00	4.00
That person stood by me when I needed him or her.	3.38	0.78	1.00	4.00	4.00
That person comforted me when I felt bad.	3.42	0.76	2.00	4.00	4.00
That person left me alone.	1.42	0.76	1.00	1.00	4.00
That person didn't show much understanding of my situation.	1.66	1.06	1.00	1.00	4.00
That person complained about me.	2.20	1.13	1.00	2.00	4.00
That person took care of many issues for me.	3.56	0.79	1.00	4.00	4.00
That person made me feel valuable and important.	3.34	0.98	1.00	4.00	4.00
That person expressed concern about my condition.	3.52	0.79	1.00	4.00	4.00
That person assured me that I could rely on him/her completely.	3.34	0.90	1.00	4.00	4.00
That person helped me find something positive in my situation.	3.34	0.85	1.00	4.00	4.00
That person suggested what I could do so as not to think about my situation.	3.42	0.81	1.00	4.00	4.00
That person encouraged me not to give up.	3.54	0.73	1.00	4.00	4.00
That person took care of matters which I could not attend to personally.	3.76	0.52	2.00	4.00	4.00
Generally, I am very happy with that person's behaviour.	3.46	0.99	1.00	4.00	4.00

In the subscale "support needed", the highest mean result of 3.52 was obtained for two statements: *When I'm depressed, I need somebody to raise my spirits* and *I find it important to always have somebody who will listen to me*. The lowest mean result in this subscale (2.10) was demonstrated for the statement *I cope best without any help.*

The highest mean result in subscale "support sought" was obtained for the statement *When I'm worried, I look for somebody to talk to* 3.20. The lowest mean values of 2.28 and 2.30 respectively related to the statements: *In critical situations, I prefer to ask others for advice* and *I ask for help whenever I need it.*

The mean result of answers to questions in subscale "support currently received" was the highest for statements *That person took care of matters which I could not attend to personally* (3.76) and *That person took care of many issues for me* (3.56). The lowest mean value of answers was obtained for the statement *That person left me alone (*1.42).

During an analysis of the mean values obtained for particular subscales, the highest mean value of 3.50 was found in the subscale *Perceived available support*.

Table 3. Subscales of the BSSS scale – descriptive statistics

Type of support	Mean	SD	Min.	Med.	Max.
Perceived available support – in general	3.50	0.65	1.80	3.94	4.00
Perceived available support - emotional	3.49	0.66	1.50	4.00	4.00
Perceived available support - instrumental	3.51	0.67	2.00	4.00	4.00
Support needed – in general	2.86	0.47	2.00	2.75	4.00
Support sought – in general	2.73	0.81	1.40	2.60	4.00
Support currently received – in general	3.12	0.49	1.87	3.40	3.80
Support currently received - emotional	2.87	0.37	2.00	3.00	4.00
Support currently received - instrumental	3.57	0.63	1.67	4.00	4.00
Support currently received - information	3.38	0.81	2.00	4.00	4.00
Support currently received - satisfaction	3.46	0.99	1.00	4.00	4.00

In the subscale *support needed*, the overall mean result amounted to 2.86.In the subscale *support sought* the mean value was the lowest and it amounted to 2.73.

Social support and acceptance of illness

The research conducted pointed to statistically significant differences between the results obtained in the social support subscales and the levels of acceptance of illness. The patients who obtained higher mean values in the subscales of the social support scale, showed higher levels of acceptance.

Table 4. Social support subscales and the levels of acceptance of illness.

Subscales and types of social support acc. to the BSS	Level of acceptance of illness	Mean	SD	Min.	Med.	Max.	Significance level
Perceived available support – in general	Low	3.16	0.73	2.13	3.13	4.00	H=11.76 p=0.003 J-T=3.45 p=0.001
	Medium	3.45	0.63	1.75	3.63	4.00	
	High	3.91	0.24	3.25	4.00	4.00	
Perceived available support - emotional	Low	3.14	0.77	2.00	3.00	4.00	H=10.87 p=0.004 J-T=3.33 p=0.001
	Medium	3.45	0.62	1.50	3.50	4.00	
	High	3.90	0.26	3.25	4.00	4.00	
Perceived available support - instrumental	Low	3.17	0.75	2.00	3.13	4.00	H=9.51 p=0.009 J-T=3.05 p=0.002
	Medium	3.46	0.70	2.00	4.00	4.00	
	High	3.92	0.23	3.00	4.00	4.00	
Support needed	Low	2.64	0.46	2.00	2.50	4.00	H=8.42 p=0.015 J-T=2.73 p=0.006
	Medium	2.97	0.49	2.50	2.75	4.00	
	High	2.97	0.39	2.00	3.00	3.80	
Support sought	Low	2.38	0.83	1.40	2.10	4.00	H=5.22 p=0.073 J-T=2.17 p=0.030
	Medium	2.84	0.78	1.80	2.60	4.00	
	High	2.96	0.76	1.80	2.80	4.00	
Support currently received – in general	Low	2.80	0.63	1.87	2.83	3.80	H=6.68 p=0.035 J-T=2.56 p=0.010
	Medium	3.20	0.38	2.13	3.40	3.67	
	High	3.36	0.19	2.80	3.40	3.67	
Support currently received - emotional	Low	2.69	0.48	2.00	2.61	3.67	H=4.95 p=0.084 J-T=2.15 p=0.032
	Medium	2.92	0.31	2.22	3.00	3.44	
	High	3.00	0.21	2.44	3.00	3.44	
Support currently received - instrumental	Low	3.10	0.81	1.67	3.33	4.00	H=11.87 p=0.003 J-T=3.47 p=0.001
	Medium	3.72	0.42	2.33	4.00	4.00	
	High	3.87	0.30	3.00	4.00	4.00	
Support currently received - information	Low	2.78	0.89	1.50	3.00	4.00	H=14.60 p=0.001 J-T=3.86 p<0.001
	Medium	3.47	0.70	2.00	4.00	4.00	
	High	3.90	0.28	3.00	4.00	4.00	
Support currently received - satisfaction	Low	2.88	1.31	1.00	3.50	4.00	H=10.18 p=0.006 J-T=3.25 p=0.001
	Medium	3.53	0.84	1.00	4.00	4.00	
	High	4.00	0.00	4.00	4.00	4.00	

H - Kruskal-Wallis test
J-T – Jonckheere-Terpstra test
p – test probability

The strongest statistically significant correlation ($p<0.001$) was discovered between information support received currently and the levels of acceptance of illness.

In order to determine the strength of relations between variables obtained in both subscales, the Spearman's rank correlation coefficient was calculated.

Table 5. Social support subscales and the level of acceptance of illness in general.

Subscales and types of social support acc. to the BSS	R	p
Perceived available support – in general	0.565**	<0.001
Perceived available support – emotional	0.544**	<0.001
Perceived available support – instrumental	0.542**	<0.001
Support needed	0.462*	0.001
Support sought	0.414*	0.003
Support currently received – in general	0.473*	0.001
Support currently received – emotional	0.399*	0.004
Support currently received – instrumental	0.548**	<0.001
Support currently received – information	0.627**	<0.001
Support currently received – satisfaction	0.555**	<0.001

R – correlation strength between variables
****0.5≤R<0.7** high correlation
***0.3≤r<0.5** medium correlation

A high, statistically significant correlation was determined between the results in the subscale "perceived available support" – emotional and instrumental ($0.5\leq R<0.7$) and the results in the acceptance of illness scale. The higher the results obtained by the patient in this subscale, the higher is his or her acceptance of illness. The highest statistically significant level was demonstrated by the correlation between information support currently received and the results of the acceptance of illness scale ($R=0.627$).

IV. DISCUSSION

The purpose of the study was to specify the influence of social support on the level of acceptance of illness among patients with a tracheostomy tube. According to the information provided by B. Kałdon, the main reason for tracheotomy is larynx cancer [17]. And indeed, the study group included mostly patients who had a tracheostomy tube fitted due to larynx cancer. The 2009 data of the Polish National Cancer Registry demonstrates that 2413 new cases of larynx cancer were reported that year, 2123 were male patients and 290 were female patients [4]. In accordance with the statistical data, larynx cancer usually affects men aged 50-60[2] which is further confirmed by the structure of the population studied - 70% of the respondents are men 56-65 years old.

Contemporary medicine is interested in the impact of social support on health [8]. According to M. Rogiewicz [18], social support has a positive influence on recovery and the acceptance of illness. It is crucial for the chronically ill person to receive as much support as he or she needs at a given stage of illness [14]. Research conducted by S. Byra [19] among patients with spinal cord injury has demonstrated that the group of patients received less support than they needed, which differs from the results of our own study in which the level of support currently received is higher than support needed. Patients in the study group highly evaluated the perceived available support. There are people in their vicinity who may provide the patients with both emotional and instrumental support when necessary. The respondents, most of whom have had the tracheostomy tube for a long time and who have been hospitalised a number of times, evince a strong need for the presence of another person who will raise their spirits and listen to them. The analysis of the need for emotional support carried out by E. Grochans *et al* [20] in a surgical ward has demonstrated that over 80% of patients expect to be comforted in difficult situations and to when they are depressed.

The single most important source of support for the ill and suffering is family [8]. Among the respondents, 15 were not married, and 13 were widowed, which has an influence on the availability of one source of support – the spouse. Family as the originally most essential source of support does not exhaust the resources at the patients' disposal. Potential sources of support include institutions such as the health centre and hospital as well as the professionals employed there.

Patients with a tracheostomy tube are ready to ask for help when they need it or to seek advice in difficult, critical situations only to a limited extent. Rather, they look for a person to talk to when they are depressed or worried, who will comfort them. A patient's illness is not only physical – it is also a psychological disorder. The nurse who interacts with the patient is not only a potential source of instrumental and information support, but mainly of emotional support [21,22]. The research by A.

Olubiński [23] demonstrates that 100% of patients expect nurses to be above all friendly, attentive, cordial and caring. At the same time, 70% of patients expect professional help from nurses. Olubiński's research also shows that nearly 70% of patients expect the nurse to engage in conversation not only about medical problems, but only half of the patients have had such a conversation.

It must be pointed out that it is necessary to adjust the type and amount of support to the needs of the patient. The respondents think relatively highly of the available support both in the emotional sphere and when it comes to information; however, emotional support currently received is at the lowest level among all four types of support analysed.

In the authors' own study, a mean value of acceptance of illness of 25.4 was obtained which is close to the results yielded for such chronic diseases as kidney failure, diabetes, coronary artery disease, and bronchial asthma (mean values of 23.5-25.5) [24]. In our own study, a majority of patients evinced a medium level of acceptance of illness, which is similar to the results of research conducted by B. Leonek [25] among patients treated in a surgical ward. Despite the medium level of acceptance of illness in both groups, the mean acceptance of illness was higher in the latter group (27.04), which may result from the fact that the surgical patients were selected according to a good prognosis. The levels of acceptance of illness in research conducted by A. Nowicki *et al* [3] among women after mastectomy differ from the levels reported in our own study among patients with a tracheostomy tube. Women after mastectomy predominantly show a high acceptance of illness level. This may point to a higher amount of information on the illness or to the existence of a more extensive network of support.

The authors' own study has demonstrated a high correlation between the level of social support and the level of acceptance of illness. The crucial role of social support and relationships with other people is emphasised in literature as a factor facilitating the process of adaptation to chronic disease [26]. The study conducted by P. Czyżewska [27] among patients with epilepsy has also demonstrated a relation between the level of social support and the acceptance of illness. D. Olejniczak [5] has demonstrated such a relation among patients who had their larynx removed. M. Kamińska [28], who has conducted a study among patients with cancer, has proved that social support has a considerable impact on treatment and it additionally helps the ill to adapt to the new situation and accept it.

The results of the authors' own study confirm the crucial role of social support on the acceptance of illness by patients which is described in literature on the subject by other authors [29-31]. Bearing in mind the results of the authors' study, the presence of a nurse and conversation the nurse may play a vital role in the care and treatment of patients.

V.CONCLUSIONS

- Patients with a tracheostomy tube rate the highest the perceived available support and support currently received.
- In general, patients with a tracheostomy tube evince a medium acceptance of their disease.
- Social support plays a vital role in accepting illness by patients with a tracheostomy tube.
- It is advisable to specify the level of social support when diagnosing the condition of patients.

VI. REFERENCES

[1] Iwankiewicz S. (red.) Tracheotomia. Warszawa; PZWL, 2008.
[2] Latkowski J, Kosiek K. Opieka nad chorym po usunięciu krtani. Lek Rodz 2008; 3:290-296.
[3] Nowicki A, Kwasińska E, Rzepka K. i wsp. Wpływ choroby na życie emocjonalne kobiet po operacji raka piersi zrzeszonych w klubach „Amazonka". Rocznik Pomorskiej Akademii Medycznej w Szczecinie 2009;55(3):81-85.
[4] Bernacka K, Misiołek A, Treszer M. i wsp. Rak krtani i krtaniowej części gardła. Probl Med Rodz 2012; 3:56-63.
[5] Olejniczak D, Sawicka K. Ocena jakości życia u chorych po usunięciu krtani w oparciu o badania własne. Med Rodz 2013; 3: 75-78.
[6] Rzewnicki I, Jackiewicz M, Bliszewska J. i wsp. Jakość życia chorych na raka krtani. Pol Merkuriusz Lek 2005;19,111:353-355.
[7] Chmielewska E. red. Akademia walki z rakiem - wsparcie społeczne. Toruń; Wydawnictwo Adam Marszałek, 2012.
[8] Sęk H, Cieślak R. red. Wsparcie społeczne, stres i zdrowie. Warszawa; PWN, 2012.
[9] Kurowska K, Frąckowiak M. Wsparcie społeczne a radzenie sobie w przewlekłej chorobie na przykładzie cukrzycy typu 2. Diabetol Prakt 2010;11(3):101-107.

[10] Sidor-Piekarska B. red. Kompetentne wspieranie osób z niepełnosprawnością. Lublin; Wydawnictwo KUL, 2013.
[11] Kwiatkowska M. Zwyczajne towarzyszenie zamiast specjalnej troski. Warszawa; Centrum Medyczne Pomocy Psychologiczno-Pedagogicznej, 2006.
[12] Sacco WP, Yanover T. Diabetes and depression: The role of social support and medical symptoms. J Behav Med 2006; 29(6): 523-531.
[13] Skwara A, Kolarzyk E. Rola i znaczenie wsparcia społecznego w radzeniu sobie ze stresem. Med Środow 2002;5(1):15-17.
[14] Kacperczyk A. Wsparcie społeczne w instytucjach opieki paliatywnej i hospicyjnej. Łódź; Wydawnictwo Uniwersytetu Łódzkiego, 2006.
[15] Juczyński Z. Skala Akceptacji Choroby – AIS. Narzędzia pomiaru promocji i psychologii zdrowia. Warszawa; Pracownia Testów Psychologicznych, 2009.
[16] Łuszczyńska A, Kowalska M, Mazurkiewicz M. i wsp. Berlińskie Skale Wsparcia Społecznego (BSSS). Wyniki wstępnych badań nad adaptacją skal i ich własnościami psychometrycznymi. Stud Psychol 2006;44(3): 17–27.
[17] Kałdon B, Kulak I. red. Człowiek w obliczu trudnej sytuacji życiowej. Warszawa; Wyd Diecezjalne, 2001.
[18] Rogiewicz M, Pomoc psychologiczna u chorych na raka płuca. Pol Med Paliatywna 2004; 3(3):301-313.
[19] Byra S. Predykcyjna rola wsparcia społecznego w kształtowaniu nadziei u przewlekle chorych. W: Kompetentne wspieranie osób z niepełnosprawnością. Sidor-Piekarska B. (red.). Lublin; Wydawnictwo KUL, 2013.
[20] Grochans E, Wieder-Huszla S, Jurczak A, i *wsp*. Wsparcie emocjonalne jako wyznacznik jakości opieki pielęgniarskiej. Probl Hig Epidemiol 2009; 90(2): 236-239.
[21] Czachor M. Dotyk jako element pielęgnowania pacjentów z chorobą nowotworową. Psychoonkologia 1997;1:51-53.
[22] Jugowar B, Stelcer B. Spostrzeganie przez pielęgniarki ich roli w procesie wspierania pacjenta w terminalnej fazie choroby nowotworowej. Pielęg Pol 1997; 2: 121-126.
[23] Kawczyńska-Butrym Z. red. Koncepcje opieki i zawody opiekuńcze. Pracownicy socjalni i pielęgniarki. Olsztyn; Wydawnictwo Uniwersytetu Warmińsko-Mazurskiego, 2005.
[24] Niedzielski A, Humeniuk E, Błaziak P. i *wsp*. Stopień akceptacji choroby w wybranych chorobach przewlekłych. Wiad Lek 2007; LX 5-6:124-127.
[25] Leonek B, Kaczmarczyk M. Przystosowanie do choroby u pacjentów leczonych na oddziale chirurgicznym. Stud Med 2011; 24(4): 45-52.
[26] Schmidt S, Nachtigall C, Wuethrich-Martone O. et *al*. Attachment and coping with chronic disease. J Psychosom Res. 2002;53(3):763-73.
[27] Czyżewska P, Makarowicz S, Talarska D. i *wsp*. Poczucie wsparcia społecznego u osób chorych na padaczkę. Pielęg Pol 2014; 2(52): 106-110.
[28] Kamińska M, Bronikowska A, Ferańska M. i *wsp*. Rola wsparcia w zmaganiu się z chorobą nowotworową. Studia Medyczne 2014; 30(2): 115-117.
[29] Socha B, Kutnohorská J, Zielińska M , Kowalik J , Kopański Z , Skura-Madziała A, Tabak J. Jakość życia uwarunkowana stanem chorego. JPHNMR 2011 (2):6-8
[30] Socha B, Kutnohorská J, Zielińska M , Kowalik Ocena jakości życia członków rodzin pacjentów w terminalnym okresie choroby nowotworowej w warunkach domowych. JPHNMR 2011 (2):20-25.
[31] Kopański Z, Kutnohorská J, Wojciechowska M, Skura-Madziała A, Tabak J: Przewlekle chorzy wobec swojej choroby. JPHNMR 2011 (2),37-40.