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# Reaction phases following HIV positive diagnosis

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#### Summarv

Aim: The subject of the article is the process of coping with the awareness of being HIV positive and defining the phases of reaction. A patient's psychic state is subject to many changes connected with the specific character of a given somatic illness. Most commonly an illness and its after-effects are burdensome circumstances for a patient and they cause disturbances in many areas of life. The emotions connected with an illness are usually negative and intense.

**Method**: The study group consisted of HIV positive patients. They had known about their diagnosis for a period of three to sixteen months. Using the results of the Appraisal of Phases of Reaction Questionnaire they were allocated to specific phases.

**Results:** Three percent were in the shock phase and twelve percent in the reaction phase. Sixty five percent could be described as being in an adaptation phase. Twenty percent had moved to a phase of transformed self-experience, where they were able to take a different view of their lives.

**Conclusion**: Apart from the cognitive value of encountering the complexity and dynamics of reactions to being HIV positive the findings may also be applied in beginning to alleviate patients' emotional discomfort.

Key words: AIDS, emotional reaction, HIV

### Introduction

In the 80's of the  $20^{\text{th}}$  century a new, terminal disease called Acquired Immune Deficiency Syndrome (AIDS), appeared. As it is a source of many social and psychological problems [1, 2], it may be analysed from perspectives beyond the strictly medical. The article focuses on the situation of an individual directly affected by the new illness and on the process of coping with the awareness of being HIV positive.

A patient's psychological condition undergoes many changes connected with the particular character of a given somatic illness. We usually find a number of causal factors that form the basis for such changes [3, 4].

Psychologists are mainly interested in the patient's emotional and cognitive processes. They also analyse the consequences of somatic disturbances on the mechanisms

of mental regulation, that is, the influence of illness on personality. An illness and its consequences usually aggravate a patient's life and are the source of unpleasant complaints. These may frustrate the realisation of important aims and also put deeply held values in jeopardy. That is why emotions connected with an illness are mainly negative. In the case of serious illnesses strong emotional reactions usually occur when a patient learns about the diagnosis [4, 5].

Patients' reactions to HIV diagnosis – which may lead on to AIDS – have been recorded by Nordegren [6], who mentions the four-phase distinction made by Swedish psychologists:

- a) shock phase learning about being HIV positive, as well as about having other incurable diseases, is a shock. For some, the test result is perceived as a death sentence and the prevailing feeling is that life is ending and that committing suicide is the best solution. Others do not want to believe what has happened to them. In the first phase the most common reactions are to dispute the results or to develop suicidal tendencies. The reaction of contesting the disease is extensively described in the literature [2, 3, 4]. The rejection of information about the illness has an unconscious character. It helps the patients to defend themselves against fear and, in respect of the given features it may be regarded as a kind of defense mechanism acting to efface traumatic experiences from memory.
- b) reaction phase this begins when a person infected with the HIV virus becomes completely aware of the situation. It abounds with the question, 'why me?' and a feeling of unfairness. Some patients can bear a grudge against people from whom, in their opinion, they could have caught the virus. Another possible feeling is connected with the urge to take revenge by deliberately spreading the virus. According to Nordegren [6] suicidal reactions are also features of this phase.
- c) adaptation phase the patient begins to understand that his life will change irrevocably. At this time many people become more active and involve themselves in settling all the necessary and important matters concerning their future affairs.
- d) transformed self-experience phase this phase lasts till the end of life. The strong fear of death, which characterised previous phases, turns into an awareness illustrated by the statement, 'I am infected, but there is a chance that I may live for several more years. Perhaps by that time an effective cure will have been discovered'. Many people suffering from AIDS and other incurable diseases display a remarkable attachment to life. They want to live with dignity and to devote themselves to what is most valuable in human affairs.

The Swedish scientists defining the fourth phase emphasised the positive impact of an illness on personality development. One may consider this as over-optimistic, but theoretical considerations, as well as clinical examples, demonstrate that people are able to use their experience of illness creatively and develop and enrich their personalities. Meanwhile, most research states the mainly negative and disordering impact of serious and long-term diseases on personality. Effects like an increase in egocentric regulation, fear and depression are worth mentioning here [2, 3, 4].

# Material and method

The research was conducted in the *Familia* Addiction Treatment Centre in Gliwice, Poland, and the Urbanowicz-Koœny Silesian Regional Centre for AIDS Diagnostics

and Therapy in Chorzów, Poland. The study group consisted of sixty people infected with the HIV virus. They had known about their diagnosis for a period of three to sixteen months.

Since, as it has been pointed out, the population specifics of the HIV positive people in Poland is that a great majority are the persons who have been infected through the use of drugs (around 70%) a decision has been made to include the persons infected in this way into the study group.

The second criterion applied during the selection process for the study group was duration of the period from the moment when patients were informed of being HIV positive. The researched persons have been selected according to the criterion that the period should last at least 3 months – it is a minimal period in which it is possible to complete a cycle of reaction phases following diagnosis concerning being HIV positive [6].

Study group data

Table 1

| Age              | Number of subjects | Pacarlage  |
|------------------|--------------------|------------|
| 12-30            | 46                 | 78%        |
| 31-44            | 14                 | 24%        |
| Biucetion        | Number of subjects | Parcentage |
| Rimary school    | 31                 | 52%        |
| Secondary school | 10                 | 31%        |
| Offers           | 10                 | 17%        |
| Civil status     | Number of subjects | Pacarlage  |
| Married          | 16                 | 27%        |
| Divorced         | 17                 | 22%        |
| Single           | 27                 | 4576       |

As we can see, the participants were between eighteen and forty-four years old with the young a clear majority. Most were single and had either left school at sixteen or had a vocational education.

The research deployed the Appraisal of Phases of Reaction Questionnaire developed with reference to Nordegren's [6] typology of reaction phases to HIV positive diagnosis. First, statements characteristic for each phase were specified. In the pilot research 36 statements have been used. Then, conformational parametric analysis was carried out. The criterion of items belonging to given parameters was the value of the charge exceeding 0.4. The criterion has not been fulfilled by 4 items that have consequently been rejected. The items were sorted into four phases: shock, reaction, adaptation and transformed self-experience. The reliability of the  $\alpha$  Cronbach's parameter was 0.87 for the shock phase subscale, 0.83 for the reaction phase subscale and 0.76 and 0.74 respectively for the adaptation and transformed self-experience subscales. Finally, each of the reaction phases is described by 8 items. The whole questionnaire consists of 32 items. These are examples of statements found in the Appraisal of Phases of Reaction Questionnaire:

- 'I can't understand why it happened to me'
- 'I'm beginning to find a real sense of life'
- 'I'm trying to solve my problems.'

#### Results

On the basis of the results received in the Appraisal of Phases of Reaction Questionnaire subjects were allocated to one of the particular phases. The chart below presents the results.

Table 2

Number of people allocated to given phases

| Rese                                 | Number of subjects | Pacarlage |
|--------------------------------------|--------------------|-----------|
| Shock phase                          | 2                  | 3%        |
| Reaction phase                       | 7                  | 276       |
| Adapterion phase                     | 30                 | 65%       |
| Thereformed self-operions e<br>phase | 12                 | 20%       |

Two out of sixty, or three per cent, of the study group were consistently in the shock phase with seven, or twelve per cent, in the reaction phase. There were 39 people, or sixty-five per cent, in the adaptation phase. Finally, the reactions of twelve of the group were typical of the transformed self-experience phase.

A correlation between the age of the people when they realize to have acquired HIV and a period necessary to achieve adaptation phase and transformed self-experience phase has been estimated. The correlation coefficient amounted to r (-0.42).

We may thus conclude that the older the resarched people were the shorter was the period necessary to achieve phases connected with adaptation to the existing situation.

#### **Discussion**

The results received paralleled Nordegren's typology of reaction phases following HIV positive diagnosis. The majority of the study group - 65 per cent - were in the adaptation phase that follows the shock and reaction phases. This means that they were aware of the changes taking place in their lives. They were beginning to learn how to function in a radically new reality. The emotions characteristic of the first two phases are milder and significantly less disturbing. At this time, many patients are active settling affairs influencing their future. A greater sense of maturity was found in the twenty per cent in the transformed self-experience phase. They wished to conduct themselves with dignity and to devote themselves to the things they most valued. Their hierarchy of values had changed and they were able to distance themselves from sources of anxiety and fear. Instead, they focussed on the deepest aspects of reality with values like love and friendship becoming more precious. Some research suggests that,

while interpersonal conflicts became sharper, the social context of attitudes towards the patients is conducive to the transformations characteristic of the last phase. Other research finds that high quality of life in HIV infected people correlates favourably with social support and success in coping with stress. An unfavourable correlation, though, was noted where the illness was perceived as a punishment for improper behaviour. This factor can cause fear and depression [8].

Twelve per cent of the study group were in the reaction phase associated with a feeling of unfairness and of being undeservedly hurt by adversity. Bearing a grudge against the person who probably infected them is another dominant feeling. Some felt guilty about those they may have infected.

The smallest proportion, three per cent, was in the shock phase where the initial reaction is usually to contest the test results and to have suicidal tendencies and thoughts [4, 9]. Acute fear connected with the awareness of being HIV positive can be a reason for using defence mechanisms aimed at relieving tension and reducing discomfort. One of the most common is to reject threatening and frightening information, with the patient questioning the diagnosis and hoping that it is a mistake [9, 10]. This rejection has a negative influence on the patient's physical condition, and research suggests that it accelerates the development of AIDS. To counter this, the emphasis is put on implementing cognitive-behavioural therapy. One of its aims is to decrease the level of stress hormones such as cortisone, whose immunosuppressive action has a fatal influence on the patient's physical condition [4].

Suicidal tendencies and thoughts are the second element connected with the high tension caused when a patient is informed of being HIV positive. Strong negative emotions intensify the conviction that previous life plans are impossible to realize and the eagerness to relieve the high stress may lead to suicide attempts. Suicidal tendencies and thoughts turned out to be the dominant factors indicating the shock phase. This is why the influence of factors reducing patient discomfort, such as social support or cognitive-behavioural therapy, is worth emphasising [5, 6, 7, 11].

On the basis of the obtained results it has also been concluded that the older the researched people were the shorter was the period necessary to achieve phases connected with adaptation to the existing situation. We may suspect that the phenomenon could be connected with several factors.

First of all – with bigger life experience resulting in more ways of coping with difficult situations [12]. The insofar experiences could contribute to an individual's view that facing difficult situations is a natural element of reality and one should be prepared for it.

We may also assume that the quicker achievement of the adaptation reaction phases, characteristic of older persons is connected with the positive influence of social support what has been confirmed by the earlier research [11]. Older people have usually had more opportunities to create interpersonal relations and thus to develop a social support network.

The insofar made research [3, 4, 11] shows that closer contacts with others may serve as a buffer for negative consequences of life crises, e.g. facing fatal diseases. The persons giving social support help an individual in overcoming emotional problems.

During such contacts an individual gets a message that he or she is loved, important. In addition, he or she may confirm whether his or her thoughts and actions can be classified within a given norm. This way it is also possible to compare one's feelings connected with traumatic experiences with the feelings of other people. Such comparison processes may decrease a level of fear [9, 11].

Participation in the stable social groups is for many reasons important for people. First of all, it gives a feeling of belonging and safety and makes it possible to cope with reality, in spite of ever-present stressors and encountered difficulties. The persons deprived of buffer influence of social support are more likely to experience psychic and physical dysfunctions. Lack of social relations has been classified as one of the main factors of lack of immunity in difficult situations [4, 11]. Consequently, we may say that social support increases ill persons' potential abilities to cope with the difficult situation they are in.

Apart from the cognitive value of encountering the complexity and dynamics of reactions to being HIV positive, the findings may also be applied in beginning to alleviate patients' emotional discomfort, so that they may reach the adaptation and transformed self-experience phases more swiftly. Two complementary solutions are suggested here. One is connected with psychologists employed in centres for HIV positive individuals. They could be a source of support for patients and could advise them on how to cope with negative emotions and, if necessary, help them resolve family conflicts.

The second possible solution is based on organising and supervising peer-support groups. These integrate and mobilise people who share a common adversary and can be amazingly successful. Patients benefit from mutual support and problem solving; they accept others and are themselves accepted in turn. This enables them to maintain or restore self-esteem.

## **Conclusions**

- 1. The results received paralleled Nordegren's typology of reaction phases following HIV positive diagnosis.
- 2. Suicidal tendencies and thoughts are connected with the high tension caused when a patient is informed of being HIV positive. This is why the influence of factors reducing patient discomfort, such as social support or cognitive-behavioural therapy, is worth emphasising.
- 3. Apart from the cognitive value of encountering the complexity and dynamics of reactions to being HIV positive the findings may also be applied in the beginning to alleviate patients' emotional discomfort.

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