

An Exploratory Study of the Use of Nutritional Approaches in the Treatment of Suicide-Prone Persons

Leonard J. Hippchen, Ph.D.

BACKGROUND OF THE STUDY

Introduction

Suicide is one of the ten leading causes of death in the United States (Zung, 1979). More than 200,000 persons attempt suicide each year, and about 25,000 are successful. More than 4,000 of the completed suicides are in the 15 to 24 year age group (Rosenkrantz, 1978). Frederick (1978) has reported that suicide rates among persons in the 10 to 19 year age group have tripled since the 1950's.

Suicide at any age can be a tragic event, but increases in suicide among the youth of America have brought the problem to the attention of public health officials since the mid-1960's. These efforts have been publicized largely through the efforts of the Los Angeles Suicide Prevention Center and the National Institute of Mental Health's Center for the Study of Suicide Prevention. Organization of the American Association of Suicidology in 1968 also has focused further attention on the suicide problem (Maris, 1969).

**Department of Administration of Justice & Public
Safety Virginia Commonwealth University**

One of the more tangible results of these publicizing efforts has been the establishment in most major cities of the United States of suicide prevention centers. As early as 1968 there were about 75 such centers in operation in the country. A survey of suicide prevention centers in the United States by Fisher in 1973 reported operational data on 142 centers. It is estimated that today the number of centers is in excess of 160.

In addition to these clinically-oriented services, many United States communities maintain 24-hour "hot line" telephone service centers. The largest network of these centers is Contact-Teleministries USA, which in 1978 was coordinating the activities of 78 centers, 35 satellite services, 21 youth services, and 19 services for the deaf. These programs deal with a wide variety of crisis services, including those for suicide problems.

One of the problems which has emerged in development of suicide prevention centers is that they seldom are used by suicide-prone persons. Maris (1969) reported on a study in St. Louis which showed that only two percent of completed suicides had contacted their suicide

prevention center. A 1978 study by Shafii, et al. (1979) in the same general population area concluded that 90 percent of the children and youth who committed suicide had never received any psychiatric or mental health care. Shafii stated that a major problem is to educate parents, teachers, family practitioners, pediatricians, and clergymen, and he recommended that programs be established to aid these persons to recognize the early signs of suicidal behavior.

Theoretical Causation of Suicide

The major theoretical explanations of suicidal behavior in contemporary times have come primarily from the disciplines of sociology and psychology-psychiatry.

A major etiological position in sociology states that suicide can be seen as an indicator of the failure of morality, a lack of social integration, of the malfunctioning of the constraining influences of society (Maris, 1969). A typical psychological-psychiatric explanation would tend to view suicidal behavior as an act of aggression which has been turned against oneself rather than against the outside world (Hartman, 1978).

Frederick (1978) has stated that male suicide victims tend to come from homes with an inadequate or broken father-son relationship, while the young female tends to have a narcissistic and demanding mother together with an ineffectual father. He reports that the typical problems of self-perceived ineptitude, helplessness and hopelessness are indicated by symptoms of anxiety, sleeplessness, rejection, and frustration. Heavy smoking and drug and alcohol abuse also tend to be involved.

Zung (1979) has identified the clinical features that are important to establish in order to identify a person at high risk for suicide: presence of a depressive disorder; presence of anxiety and agitation; feelings of decreased physical well-being, with documented multiple physical ailments; presence of drug abuse, including alcoholism and taking medications such as sleeping pills; presence of self-blame and guilt; loss of self-control with fits of anger and loss of temper; and lack of a support system - feeling that there is no one the patient

can turn to, and that there is no one who is dependent on him.

One of the most significant problems in the areas of theoretical development and applied clinical practice in suicide is the fact that the large number of recent biochemical studies of human functioning largely have been overlooked by the field. Most emphasis, as has been indicated, has been on sociological and psychological-psychiatric factors. Although these factors are important, recent research in biochemistry suggests that this new area of theoretical and applied clinical development is equally important.

A massive and increasing number of scientific and clinical studies indicate that behavioral symptomatology — identical with that described as deriving from socio-psychological factors — also can be caused, or is related to, possible biochemical abnormalities in the human organism. (Pfeiffer, 1975; Pauling, 1968; Hoffer, 1978).

A number of studies have found that the same symptoms as related to socio-psychological factors can also be found in relation to the vitamin deficiencies or dependencies of B1, B2, B3, B6, B12, Biotin, Vitamin C, and to the mineral deficiencies of lithium, potassium, magnesium, calcium, and iron (Pfeiffer, 1975; Gerras, 1977; Rodale, 1977). The same symptom patterns also have been found among persons suffering from a wide variety of environmental contaminants, i.e., food allergies; food additives (Dickey, 1976); from various metabolic disorders, i.e., thyroid dysfunction, adrenal dysfunction, hypoglycemia (Ross, 1975; Newbolt, 1978; Williams, 1977; Hawkins and Pauling, 1973); and from various malabsorption problems (Watson, 1972). Other studies related to malfunctioning of the brain neurotransmitters (Pfeiffer, 1975), to low histamine levels (Pfeiffer, 1975), and to brain damage (Monroe, 1978), also have shown similar symptomatology.

In addition to these etiological concerns, however, numerous clinical experiences have confirmed the impression that a nutritional approach to suicide-prone persons can be most effective in alleviating

the typical symptom patterns. As Pfeiffer (1975) has stated, "learning problems, senility, alcoholism, and suicidal tendencies have been affected by proper nutrition and nutrient therapy." Ross (1975) has stated that he has seen countless potential suicides saved through the various methods of nutritional and adjunctive therapy. He confidently concludes that with competent medical, psychiatric and nutritional help it should be possible to prevent suicide in most cases.

PURPOSE OF THE STUDY

Zung (1979) reviewed the major intervention strategies typically used by those in the mental health field in dealing with suicide-prone persons — hospitalization, for serious cases; psychotropic drugs, if hospitalization, is not needed, i.e., antipsychotic, antidepressant, and anti-anxiety drugs; and development of a good physician-patient relationship. Nutritional therapy is not considered by the typical mental health practitioner, probably because the knowledge related to its use is quite new and not taught in most medical schools in the country. However, Pfeiffer (1975) says that in most cases it should be the treatment of choice. It stands to be less harmful and it is less expensive and bothersome for the patient.

Especially because the new nutritional approaches to treatment of suicidal behavior and related disorders where used have been shown to be so highly efficient and effective, it is important that broader exploration of possible uses be undertaken. The problem of suicide, especially among the youth of America, is too serious for professionals to become bogged down in emotional disagreements. What appear to be needed, are more facts, more explorations, more demonstration testing. The purpose of this study, therefore, is to gather more facts, to explore attitudes among mental health professionals concerning the use of nutritional therapy with suicide-prone persons, and to encourage wider testing of its possible efficiency and effectiveness.

Specifically, this study will explore the following questions:

1. To what extent are directors of suicide-prevention centers and contact-telemistry

centers in the United States aware of research studies supportive of nutritional therapy for suicide-prone persons?

2. What are the attitudes of these directors towards the use of nutritional therapy in therapeutic programs for suicide-prone persons?

3. To what extent do these directors use or support nutritional therapy approaches in their suicide-prevention or contact centers, and to what extent do they know of other related programs using such approaches?

4. To what extent would these directors be interested in learning more concerning the successful use of nutritional therapy in suicide-prevention programs?

5. To what extent do nutritionally-oriented physicians-psychiatrists feel that suicide-prone persons may be suffering from ecologic-biochemical imbalances?

6. What specific diagnostic and therapeutic approaches are typical in treatment of suicide-prone persons among nutritionally-oriented physicians-psychiatrists, and how successful have they been in this treatment?

METHODOLOGY OF THE STUDY

The study utilized two questionnaires, which were mailed to selected groups of professionals involved with suicide-prone persons (see Appendix for questionnaires used). The fact that the mail survey was conducted during the summer months (1979) undoubtedly had somewhat of a negative effect on the return rate. However, respondents were offered a copy of the published findings, if desired, as an incentive to secure their help.

One questionnaire was designed and mailed to 74 directors of programs listed in the 1975 (revised) Directory of Suicide Prevention/Crisis Intervention Agencies in the United States. This directory does not list all of the programs in the country, but it was felt that this list should be sufficiently up-to-date and adequate in size and scope for the purposes of this exploratory study. Because of budget limitations, the survey did not

utilize a broader mailing, nor did it use follow-up mailings or include use of a self-addressed postage paid return envelope, which would have been desirable. Of the total 74 questionnaires mailed, 16 were returned as undeliverable because of address changes; 28 questionnaires were completed and returned, which represents a 48 percent return rate of delivered questionnaires.

This same questionnaire also was mailed to a selected group of 50 Contact-Teleministry USA centers, as listed in the Directory of Centers and Services, 1978 revised. These 50 agencies were selected from among the total of 78 Teleministry centers operating in the United States at the time, making an attempt to select at least one center from each of the States represented. No follow-up mailings or return envelopes were used. Of the 50 agencies contacted, only two were returned for address purposes; 26 centers completed and returned their questionnaires — a 54 percent return rate on delivered questionnaires.

A second questionnaire was designed and mailed to 100 known nutritionally-oriented physicians and psychiatrists (see appendix for questionnaire). The names of these medical professionals were obtained from lists supplied by the Huxley Institute of Bio-social Research (New York), and the American Academy of Medical Preventics (California). No follow-up mailings or return envelopes were used. Of the 100 questionnaires mailed, 23 were returned because of inadequate address, and 33 completed questionnaires were returned — a 43 percent return rate on delivered questionnaires.

Because of the financial limitations of the study, only a limited mailing of procedures could be utilized, but the returns appear to be adequate for the needs of this exploratory study.

THE FINDINGS

Suicide Prevention Center Responses

On the question concerning knowledge of research findings relating vitamin-mineral deficiencies to suicidal tendencies, 71 percent of the prevention center respondents said that they had no knowledge of such

research; 29 percent said they did.

In spite of this lack of specific research knowledge, however, 75 percent of the respondent directors said that they feel that nutritional diagnosis and treatment should be included in therapeutic programs' for suicide-prone persons.

On the question concerning their immediate use of nutritional therapy in their own program, or whether they were aware of any suicide prevention program in the country which used such approaches, 100 percent responded in the negative. However, 93 percent said that they would be interested in learning more concerning successful use of nutritional therapy in suicide prevention programs.

Contact-Teleministry Center Responses

Seventy-seven percent of the Contact center directors said that they were not aware of any research findings relating vitamin or mineral deficiencies to suicide. Twenty-three percent reported limited knowledge of this research. However, 88 percent thought that nutritional diagnosis and treatment should be included in suicide prevention programs.

None of these directors were aware of any suicide-prevention/crisis intervention programs in the country which used nutritional therapy, but all responded that they would like to learn more about successful use of nutritional therapy in suicide prevention.

Nutrition-Oriented Physician Responses

These physicians were asked to what extent they felt that suicide-prone persons may be suffering from ecologic-biochemical imbalances. Eighty-eight percent of the respondents said there was a high probability; ten percent said there was some possibility; two percent said there was limited possibility; and zero percent said there was no possibility.

The next question asked these physicians to identify the specific types of ecologic-biochemical symptoms which they expect to find upon examination of suicide-prone persons. The most frequently mentioned

areas were hypoglycemia and cerebral allergies.

The second most frequently mentioned area included vitamin deficiencies and mineral deficiencies. The third group included high levels of toxicity from environmental contaminants, chemical imbalances in the neuro-regulators of the brain, and pre-post natal minimal brain damage. Other areas mentioned included histadella, krypto-pyrollurea, and a combination of several of the most frequently mentioned areas, i.e., hypoglycemia, cerebral allergy, toxicity.

The most frequently mentioned diagnostic tests and procedures used, in order of frequency listed include:

1. A thorough medical-social case history;
2. The Hoffer-Osmond Diagnostic Test (HOD).
3. The Experiential World Inventory (EWI).
4. Dietary Pattern Analysis.
5. Fasting with use of Provocative Testing for Cerebral Allergies.
6. Five or Six-hour Glucose Tolerance Tests (hypoglycemia).
7. Urinalysis for kryptopyrollurea (mauve factor).
8. Hair Analysis for vitamin-mineral excesses-deficiencies.
9. A wide assortment of blood tests, i.e., blood histamine, thyroid function, pancreatic-adrenal function, RAST, SMA-12-60, CNS, CBC, vitamin profile of serum, etc.

Other less frequently mentioned diagnostic testing included the Heidelberg gastric analysis, Mediscreen Test for hormones, 17 Ketogenic steroids, Estrogen-Testosterone Tests, EEG brain wave scan, cytotoxic testing for food allergies, stool analysis for malabsorption, lactose tolerance test.

These physicians also were asked to identify specific nutritional and supportive therapy which they felt would be most appropriate in treatment of suicide-prone persons. In terms of frequency of mention, the following treatments were listed:

1. A dietary control plan, emphasizing high protein, low carbohydrates, high fiber, and elimination of "junk foods," mainly processed food.

2. Use of selective megavitamin therapy, especially vitamins B1, B3, B6, B Complex, A, D, and E, and minerals such as magnesium, calcium, zinc, lithium, and mineral complex.
3. Use of an elimination-detoxification diet.
4. Use of supportive psychotherapy.
5. Use of antidepressants, if needed.
6. Use of physical exercise.

Other suggestions for treatment included use of prayer, change of lifestyle, homeopathic medicine, adrenal cortex extracts, proteolytic enzymes and vitamin ACE injections.

Additional Comments and Case Histories

These physicians also were asked to make additional comments concerning their approaches to suicide-prone patients and to list typical case histories. Some of their typical comments follow:

- *I have quite a few cases.*
- *I have had many cases, especially food sensitivities provoking suicidal depression. When the offending agents were identified and eliminated, and when the autonomic nervous system and endocrine systems are brought into balance, there usually is a very clear shift away from the suicidal depression.*
- *A few cases of chronic depression and suicidal potential handled successfully are reported in my new book.*
- *Many emotional disorders have been helped and regulated by using nutritional therapy approaches.*
- *I have had a large number of patients who have had suicidal thoughts. A few had made numerous attempts and were on heavy medication before starting nutritional treatment. Almost all of these patients have benefited from individualized nutritional approaches. I have had only two patients who after starting and while on supplements committed suicide. The families of the patients felt that the patient was improving in spite of the suicide. I have had two others who after stopping their nutrient program committed suicide. These two did not get family support. These are out of a possible 700 who have had some suicidal tendencies.*

- *So many patients have been on drugs for so long that their enzyme systems have been severely damaged. Even with this problem we usually are quite successful, but occasionally have failures.*
- *How many suicide-prone patients that talk about it also will attempt it! Yet, with a simple nutritional program we have changed their litany on death and they are successful in daily life.*
- *Most of my files contain tons of patients with these problems.*
- *In my work at children's clinic I've had numerous occasions to treat young children and adolescents with both behavioral and bio-ecologic techniques. Some of my experience has been with delinquents and suicidal adolescents.*
- *From observations I have made on the clinical association of anxiety, I feel that the most frequently associated deficiency states are those giving rise to alteration in ionic calcium balances.*
- *In my own practices, I have seen countless potential suicides saved through use of nutritional approaches to therapy. In many cases, once the depression is gone -along with the insomnia, hopelessness, self-doubt, etc. — and the patient is returned to good health there is no reason to think of suicide as a solution.*

Following are typical case notations which were given by a number of the respondents:

- Drug addict, thief, welfare client, hypoglycemic, high Pb level. Rx — chelation therapy weekly, megavitamins, diet improvement. He now goes to church and is back with his family and works as an auto mechanic.
- Prostitute, drug addict. Abnormal G.T.T., schizophrenic, HOD test, abnormal mauve. Rx. - diet change, megavitamins, walking therapy. Prognosis: good, she is keeping her money and not giving it to her old pimp. Therefore, she knows she is getting better.
- A young woman with hypoglycemia and allergy to petrochemical hydrocarbons changed diet and moved to home with electric heat; cleared up symptoms for which she had been through twelve plus different physicians without relief.
- A man in 60's, long list of depression and inability to cope, found hypoglycemic;

dramatic elimination of depression in one week on changed diet.

- Man in 50's with long problem of depression and borderline physical complaints, irritability, difficulty relating on job; lost interest in living. Found hypoglycemic and addicted to a dozen or more soft drinks (Mountain Dew) daily. Change in diet showed marked improvement not complete until supplemented with low dosage of lithium.
- Young woman irritability and depression; found allergic to wheat; complete positive personality change within one week when off wheat. Ingestion of wheat products would bring back symptoms in full force within one-half hour.

SUMMARY AND CONCLUSIONS

The primary purpose of this study has been to explore the extent to which nutritional therapy is understood and used by mental health professionals dealing with suicide-prone persons. A second intent has been to explore the use of nutritional approaches to therapy with suicide-prone persons among nutritionally-oriented physicians-psychiatrists.

A selected group of these persons from throughout the country were contacted with use of a mail questionnaire. Because of financial limitations the study had to limit its scope and methodology. Nevertheless, the response rate and types of responses received from those participating suggest that the data may be fairly representative of practice in the United States at this time.

The findings indicate that there is a widespread lack of research and clinical knowledge relating nutritional abnormalities to suicide-prone behavior among staff of both Suicide Prevention/Crisis Intervention centers and Contact-Teleministry centers. However, a high percentage of both groups said that they felt that nutrition therapy should be used in suicide-prevention program efforts, and most said they would be interested in learning more about this relatively recent development.

Nutrition-oriented physicians-psychiatrists responding in the survey appear to have a

wealth of experience in their private practices in treatment of patients with suicidal tendencies. A large proportion appear to feel that there is a high probability that suicide-prone persons are suffering from a potential wide-range of ecologic-bio-chemical abnormalities, which is quite different from the understandings of the suicide-prevention mental health professionals. These practitioners also reported use of a wide-range of new diagnostic and treatment approaches related to nutritional therapy, and a very high degree of success in use of this treatment approach.

The results of this exploratory study indicate that agencies specifically dealing with suicide-prone persons should more fully investigate the research and clinical evidence suggestive of an ecologic-biochemical basis of suicide. Educational workshops and conferences could be arranged, inviting nutritionally-oriented and knowledgeable physicians-psychiatrists, such as those who participated in this survey.

It is generally recognized that the gap between scientific discovery and application is great — sometimes as long as 40 years. However, in the case of the recent biochemical research and clinical findings related to suicidal symptomatology, it is hoped that because our great concern, and through concerted educational efforts, this time gap, indeed, will be drastically reduced.

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APPENDIX I Suicide Prevention Questionnaire

Sent to Suicide Prevention/Crisis Intervention Agencies with the following introduction:

In completing research for my recent book: **Ecologic-Biochemical Approaches To Treatment of Delinquents and Criminals** (Van Nostrand-Reinhold, 1978) information was uncovered which suggested that suicide and the manic-depressive cycle might have a very important biochemical basis. Criminologists over the past several years have begun to show great interest in the possible biochemical aspects of suicide.

We are writing to ask your cooperation in completing the attached questionnaire, which explores the question of possible clinical application of nutritional approaches in the suicide prevention/crisis intervention agency field. We would be greatly appreciative if you could take a few minutes now to complete and return the questionnaire. We will be happy to send you a copy of the report of this study, which we also hope to present at a national meeting of criminologists.

1. Are you aware of any research findings which suggest that vitamin-mineral deficiencies might be important causes of suicide tendencies?
2. Do you feel that nutritional diagnosis and treatment should be included in therapeutic programs for suicide-prone persons?
3. Are you aware of any suicide prevention-crisis intervention program (including your own) in the country which use nutritional therapy approaches in their programs? If yes, please describe.
4. Would you be interested in learning more concerning successful use of nutritional therapy in suicide prevention programs? If yes, please give your mailing address.

Additional Comments/Suggestions: _____

APPENDIX II

Ecologic-Biochemical Aspects of Suicide-Prone Behavior and Relation of Orthomolecular Approaches to Suicide-Prone Behavior

Sent to orthomolecular physicians/psychiatrists (as listed by the Huxley Institute for Biosocial Research) with the following introduction:

In completing research for my recently edited book (**Ecological-Biochemical Approaches to Treatment of Delinquents and Criminals**, Van Nostrand-Reinhold, 1978), information was uncovered that suggests that persons suffering from suicide tendencies may have important ecological-biochemical imbalances.

Recently, I contacted 125 suicide prevention and crisis centers in the United States to inquire concerning their knowledge and/or use of orthomolecular approaches in treatment of suicide-prone persons. Not a single program reported use of orthomolecular methods (some even scoffed at the idea), but most said they would welcome additional information on the subject. This would seem to be an excellent educational opportunity!

At the present time I am gathering research and clinical case information for the purpose of preparing a summary report on the possible ecologic-biochemical aspects of suicide. If you have information which you feel might be helpful to this report, would you please take a few minutes now to complete and return the enclosed brief questionnaire? I will be happy to send you a copy of the report when it is completed. We will greatly appreciate any help you can give!

1. To what extent do you feel that suicide-prone persons may be suffering from ecologic-biochemical imbalances?

() High Probability () Some Possibility () Limited Possibility () None
2. Which specific types of ecologic-biochemical agents would you expect to be possibly related to suicide-prone behavior? (i.e. vitamins, minerals, neuro-regulators, allergies, brain damage, hypoglycemia, etc.)
3. Which specific diagnostic techniques would you use to uncover those ecologic-biochemical factors which possibly might be related to suicide-prone behavior? (i.e. interviewing strategies, paper-pencil tests, laboratory tests, etc.)
4. Which specific orthomolecular approaches to treatment of suicide-prone persons do you feel would be most appropriate, considering initial and later phases of treatment?

(Note: If you have had clinical experience with such cases, please give brief details on back side of this questionnaire)

5. If you would like a copy of the final report on this project, please give your name and address. Thanks for your help!