RESEARCH ACTIVITIES IN THE PSYCHIATRIC SERVICE AT MEMORIAL SLOAN-KETTING CANCER CENTER

Located across the street from Cornell University Medical College and Payne Whitney Clinic, Memorial Hospital is a 565-bed hospital and ambulatory care facility for cancer, associated with an extensive research component, Sloan-Kettering Institute. Beginning July 1, 1979, the Cancer Center appointed Jimmie Holland, M.D. Chief of a new Psychiatry Service, with the mandate to develop psychiatric services for cancer patients, clinical training programs in psychologic management of patients and their families and clinical psychiatric research related to the interface between psychiatry and oncology.

STAFF AND EDUCATIONAL ACTIVITIES

In the past year, the Service has established itself as a recognized and respected medical specialty in a cancer facility. This has led to rapid expansion of the Attending Staff to six voluntary psychiatrists, one Associate Attending, 5 Assistant Attending psychiatrists (one psychologist and two psychiatrists), and 2 pre-doctoral Research Fellows (see attached Service Roster). A Chief of Child Psychiatry, Dr. Yehuda Nir, began January 1, 1979 on a half-time basis to develop the pediatric liaison psychiatry area. The first two trainees completed a one-year post-doctoral Clinical Fellowship on July 1, 1978 and a third Fellow, Dr. J. Bukberg, began in training on July 1, 1978. A NIMH Training Grant was awarded for Teaching Psychosocial Aspects of Life-Threatening Illness with Dr. Holland as Program Director and Dr. Theodore Shapiro as Co-Director. The two Fellows became Attending Staff members on

July 1, 1978; Dr. Gregory Gorzynski assuming responsibility as Coordinator of Research Studies and Dr. Mary Jane Massie as Coordinator of Clinical Education. Two Cornell psychiatric residents rotate for liaison-consultation experience half-time for six-month periods.

RESEARCH ACTIVITIES

The two pre-doctoral Fellows, psychologists, are full-time in clinical research as well as a small group working at Montefiore. Hospital and Memorial Hospital in a collaborative study of psychologic response to mastectomy. Weekly Research Seminars, planned by Dr. Gorzynski as Research Coordinator, review our own projects and bring in consultants such as biostaticians, endocrinologists, immunologists, psychometricians and clinicians. Cornell medical students are accepted on research elective (two summer students) working on specific projects with Psychiatry Service staff. This approach is a useful one for teaching research and the first two junior medical students, Betsy Kindwall and Kevin Kelly, taking summer research electives in June-August, 1978 learned both clinical interviewing skills and developed a concept of measurement of clinical observations from which hypotheses could be tested. All projects below can accept students and residents as participants in clinical research.

PROGRAMMATIC RESEARCH AREAS:

Research activities hold a high priority with this group, utilizing it as a way to systematically study clinical issues in cancer and to pursue biologic correlates as they are identified. Seven major programmatic research areas are underway, representing approximately 18 protocols (some are being done in collaborative groups).

1. Clinical and Biologic Correlates of Depression

A unique opportunity exists at Memorial Hospital to study types of depression. In significant numbers, one can identify patients with depressed mood who are experiencing normal mourning for threatened loss of life. Reactive depressions are the most common reason for psychiatric consultation. Primary affective disorders are seen, but infrequently. Clinical classification of depressive states has been begun by Dr. Judith Bukberg. Drs. Gorzynski and Holland are pursuing, with Dr. Martin Sonenberg, Chairman of Endocrinology and Dr. Peter Stokes, the potential for comparative biologic studies of endogenous and reactive depression.

Patients with Herpes Simplex, a virally-induced condition common in immunosuppressed patients, is being studied by Dr. Norman Straker with Dr. Richard O'Reilly in the Department of Immunology. Levamisole, a treatment for Herpes, also acts on mood and Dr. Straker has outlined a study of the psychologic parameters.

2. Steroid-Induced Mental States

Steroids are commonly used in the treatment of cancer. Dr. Mary

Jane Massie is directing an area of investigation to study the frequency
of mood change, its nature and severity, with particular emphasis on the
clinical entity of the psychosis induced by different steroid compounds.

We hope that clinical studies can later be combined with neurohormonal
investigations.

3. Cancer Risk, Length of Survival, and Personality Factors
Considerable literature exists on 1) personality as a risk factor in
cancer, 2) the effect of life events, especially loss and onset of cancer,
and 3) personality and adaptation ("the will to live") and long or short

survival with cancer. Most of the work has been methodologically flawed. Often the research has been done in isolation from oncologic and basic science support. Several studies of personality variables are currently underway at Memorial, with close collaboration with other disciplines. Several studies are the following in this area:

- 1) Psychologic assessment of women by personality evaluation prior to breast biopsy is being done by Dr. Mastrovito.
- 2) Psychoendocrinologic and immunologic aspects of women who have survived 10 years or longer with breast cancer has been under study by Drs. Gorzynski and Holland (paper attached which was presented at the XII International Cancer Congress in Buenos Aires in October, 1978). Women who survived 10 or more years appear to have lower weights, higher sustained cortisol production and greater emotional reactivity over many years.
- 3) Prospective studies of families with high risk of colon cancer is being done with Dr. Martin Lipkin. Extensive genealogic studies of biological parameters have been carried out by Dr. Lipkin on families who have multiple polyposis, hereditary colon cancer without polyposis, families in whom members have colon cancer without hereditary history, and families with a lower than expected incidence of cancer. These groups are being planned for prospective study, with emphasis on those who have a 50% chance of developing disease, as to: 1) personality and, 2) life event changes prior to onset of disease. In collaboration with Dr. Sigurd Ackerman at Montefiore Hospital, exploratory studies of the effect of maternal separation as a stress during development and chemically induced colon cancer in rats is being carried out.

- 4) Systematic psychologic data collection on men with testicular cancer as compared to sociodemographically matched men with leukemia and lymphoma is under study at present. Dr. Gorzynski has found the possibility of abnormal psychosexual adolescent developmental changes in a higher than expected number of men who develop testicular cancer of the non-seminomatous type, as well as a high frequency of use of LSD and heroin.
- 4. Psychologic Response to Cancer and Its Treatment
 Adaptive defenses and coping strategies are under study in cancer
 as a model of life-threatening illness which occurs throughout the
 life cycle. The problems, however, engendered by certain cancers, e.g.
 testicular cancer, gynecologic and gastrointestinal, require special
 adaptative techniques. Psychologic management of patients with these
 tumors is being studied to develop guidelines to help the oncologic
 health care team in their total patient care.

Prediction of Response to Breast Reconstruction .

Many women who survive mastectomy for breast cancer now are seeking breast reconstruction. There is an increasing need to identify those women who have unrealistic goals and expectations to help in guiding the plastic surgeon in planning for surgery. Dr. Bukberg, Julia Rowland, and Dr. Holland with Dr. Toros Chaglassian, Chief of Plastic Surgery, have a joint project underway to study this.

5. Psychologic Responses to Specialized Environments

The Reverse Isolation Unit, as a part of the Bone Marrow Transplant

Center, is being studied for immediate and long-term effect upon

children and adults by Dr. Straker and Julia Rowland, psychology Fellow.

6. Psychologic Responses of the Health Professional in the Oncology Setting

The psychologic interaction between patients and oncologic staff under study can be framed as questions in several areas:

When is a psychiatric consultation called in the course of a hospitalization for cancer? (Dr. Bukberg)

What is the effect of the doctor-patient interaction in relation to the patient accepting or rejecting a chemotherapy regimen (e.g. informed consent)? (Psychosocial Collaborative Oncology Group)

What attitudes do physicians themselves have about cancer and its treatment? (PSYCOG)

- 7. Collaborative Psychosocial Research in Cancer
 Participation in three collaborative research groups accounts for
 several projects in which a single protocol is carried out in several
 centers.
 - A. Cancer and Acute Leukemia Group B, an NCI national clinical trials group, is the first of the 20 groups to systematically collect psychosocial data. Ten CALGB protocols are accruing psychosocial data from 33 institutions. It is received and prepared for the computer bank at the Psychiatry Office of CALGB by Ms. Bahna and Dr. Holland, who serves as Chairman of the Psychiatry Committee. Julia Rowland, developmental psychologist, is participant in an assessment of long-term psychologic and cognitive effects of intrathecal methotrexate and irradiation to the brain in children

who are long survivors (and likely cured) of acute lymphocytic leukemia, as part of three centers studying children who randomly received these treatments three or more years ago.

- B. The Psychosocial Collaborative Oncology Group is comprised of five co-investigators under Dr. Arthur Schmale, University of Rochester, Principal Investigator, to develop psychosocial measurement techniques in oncology and to identify major psychosocial issues and interventions. Some of the above studies are being implemented through this group.
- C. The Psychosocial Study of Breast Cancer Contract is a 5-center single study of 1500 women studied after mastectomy, cholecystectomy and benign biopsy or no surgery, to identify the stresses unique to mastectomy. This project is being done jointly at Montefiore Hospital and Memorial Hospital for the National Cancer Institute (Dr. Holland and D. Penman).