

**REPORT OF THE
JOINT SUBCOMMITTEE STUDYING**

**The Needs Of Head And
Spinal Cord Injured
Citizens, The Need For
Research, And The Needs
Of All Physically
Handicapped Persons**

**TO THE GOVERNOR AND
THE GENERAL ASSEMBLY OF VIRGINIA**



HOUSE DOCUMENT NO. 2

**COMMONWEALTH OF VIRGINIA
RICHMOND
1991**

MEMBERS OF THE JOINT SUBCOMMITTEE

Alan E. Mayer, Chairman
Arthur R. Giesen, Jr., Vice Chairman
E. Hatcher Crenshaw, Jr.
Virgil H. Goode, Jr.
George H. Heilig, Jr.
Kevin G. Miller
Richard L. Saslaw
Susan F. Urofsky, ex officio

STAFF

LEGAL AND RESEARCH

Division of Legislative Services
Brenda H. Edwards, Senior Research Associate
Norma E. Szakal, Senior Attorney
Marcia A. Melton, Executive Secretary

ADMINISTRATIVE AND CLERICAL

Office of the Clerk, House of Delegates
Barbara Hanback

TABLE OF CONTENTS

	Page
I. Authority for the Study	1
II. Activities of the Joint Subcommittee	1
III. Findings of the Joint Subcommittee	3
IV. Recommendations to the Commission on the Coordination of the Delivery of Services to Facilitate the Self-Sufficiency and Support for Persons with Physical and Sensory Disabilities	24
V. Recommendations of the Joint Subcommittee	27
VI. Conclusion	35
VII. Bibliography	37
VIII. Appendices	
A. House Joint Resolution No. 135 (1988) House Bill 1486, Long-Term Rehabilitative Case Management System	38 40
B. House Joint Resolution No. 287 (1989)	43
C. Summary of Legislation Enacted by the 1989 and 1990 General Assembly	45

**Report of the
Joint Subcommittee Studying the Needs of
Head and Spinal Cord Injured Citizens, the Need for Research,
And the Needs of All Physically Handicapped Persons
Pursuant to House Joint Resolution No. 287**

To
The Governor and the General Assembly of Virginia
Richmond, Virginia
January, 1990

To: The Honorable Lawrence Douglas Wilder, Governor of Virginia
and
The General Assembly of Virginia

I. AUTHORITY FOR THE STUDY

During the 1988 Session of the Virginia General Assembly, House Joint Resolution No. 135 (Marks) and House Joint Resolution No. 149 (Mayer) were introduced to request the creation of a joint subcommittee to study the needs of head and spinal cord injured citizens and head injured citizens, respectively. After reviewing the resolutions, the General Assembly determined that a broader perspective of the issues would better serve and assist the Commonwealth in developing sound health and social policies to meet their needs. To facilitate an examination of these issues, the General Assembly incorporated House Joint Resolution No. 149 into House Joint Resolution No. 135, which was passed to create a joint subcommittee to study the needs of head and spinal cord injured citizens, and related research needs in the Commonwealth. The 1989 General Assembly continued the study for one year under House Joint Resolution No. 287, which incorporated Senate Joint Resolution No. 143 (Colgan), to provide that the Joint Subcommittee also study the needs of all physically handicapped persons.

The members of the Joint Subcommittee are Alan E. Mayer, Chairman; Arthur R. Giesen, Jr., Vice Chairman; Delegates E. Hatcher Crenshaw, Jr.; George H. Heilig, Jr.; and Senators Virgil H. Goode, Jr.; Kevin G. Miller; and Richard L. Saslaw. Altamont Dickerson, Jr., Ed.D., Commissioner of the Department of Rehabilitative Services, served ex officio. Ms. Susan Urofsky succeeded Dr. Altamont Dickerson as Commissioner of Rehabilitative Services and served in that capacity as an ex officio member of the Joint Subcommittee.

II. ACTIVITIES OF THE JOINT SUBCOMMITTEE

During the second year of its study, the Joint Subcommittee focused its attention on the issues which it had continued for further examination and the needs of all physically handicapped persons. The Joint Subcommittee included the following issues in its deliberations:

- The extent to which persons with traumatic brain injury are misdiagnosed and inappropriately placed in state mental health institutions;
- The relationship between traumatic brain injury and crime;

- The needs of head and spinal cord injured children, particularly those between the age of fifteen and twenty-one;
- The need for a community coordinator at the state's medical schools;
- The need for regional demonstration projects for the long-term care of low-level functioning head injury survivors and demonstration behavioral treatment programs;
- The adequacy of coverage and benefits of health insurance for central nervous system disorders;
- The need for establishing revenue generating initiatives to fund services and research for persons with central nervous system disorders;
- The need to request the Medical Society of Virginia to encourage practicing physicians to increase their patient education efforts to individuals with central nervous system disorders, particularly those with head and spinal cord injuries, and to provide more information to the families of such individuals concerning the nature of the disability and care of the patient upon discharge; and
- The review of the provisions and status of implementation of the "*Technology-Related Assistance for Individuals with Disabilities Act of 1988*" to ensure that Virginians of all ages may avail themselves of assistive technology devices that would enable them to "participate independently in the tasks of daily living."

To accomplish its objectives, the Joint Subcommittee conducted meetings and a public hearing to solicit public comment concerning the needs of head and spinal cord injured and physically handicapped citizens. It combined its discussions on the needs of such individuals and other relevant issues with presentations from persons with expertise in such areas and conferred extensively with the medical community, state agency heads, advocacy groups, caregivers, and other interested parties concerning the needs of persons with traumatic brain injury, spinal cord injury, and physically handicapping conditions in order that it might offer feasible alternatives to state health and social policies, where appropriate, and develop recommendations which would address the needs of such persons effectively and efficiently.

The Joint Subcommittee categorized the issues and organized its meetings such that each meeting would be devoted to an in-depth review of certain issues. The first meeting included a staff review of the Joint Subcommittee's activities during its first year of the study, its findings and recommendations to the 1989 General Assembly, including a status report on the implementation of House Bill No. 1486, the Long-Term Rehabilitative Case Management System, and a presentation concerning the needs of the physically handicapped.

Subsequent meetings were devoted to discussions of the following issues: the educational needs of traumatically brain injured, spinal cord injured, and physically handicapped persons; the need to increase and improve transportation services for the physically handicapped; initiatives for assessing the rehabilitation, social, housing, employment and behavioral treatment needs of these persons; an evaluation of the level of medical assistance and health care services to the

handicapped population with particular emphasis on the need to increase and improve such services; an examination of insurance issues, including the need for coverage of rehabilitative and other appropriate medical services; and a review of fund-generating initiatives.

III. FINDINGS OF THE JOINT SUBCOMMITTEE

During the course of its study, the Joint Subcommittee determined that persons suffering from head and spinal cord injuries share with other persons who have central nervous system disorders the need for adequate housing, transportation, on-going health and medical care, rehabilitation, case management, and regenerative research. The range of cognitive deficits and sensory and physical disabilities is unending. Many of these persons may have a head or spinal cord injury or both in addition to other equally debilitating disorders. However, with appropriate education and training, many of these individuals can be trained and rehabilitated to manage their lives, maximize their innate abilities, and strengthen function. Although efforts to coordinate the delivery of essential services to such persons in an effective and cost-efficient manner was begun with the passage of House Bill 1486, other critical needs of this population require further examination and resolution.

■ *Federal and State Laws Concerning the Rights of the Handicapped*

The Provisions of Federal Law

At the request of the Joint Subcommittee, the staff presented a comprehensive review of the requirements of state and federal laws pertaining to the rights of the handicapped. The most significant federal legislation concerning the handicapped are P.L. 94-142, as amended, the Education for All Handicapped Children Act, and P.L. 93-112, the Rehabilitation Act of 1973.

P.L. 94-142, as amended, the Education for All Handicapped Children Act

This law mandates that an appropriate education in the least restrictive environment and an individualized education program (I.E.P.) be provided to every handicapped child between the ages of six and twenty-one in the country. It requires that such program of instruction emphasizes special education and related services designed to meet each child's unique needs, that the rights of handicapped children and their parents or guardians are protected, that states and localities are assisted in providing the education of all handicapped children, and that the effectiveness of the efforts to educate handicapped children be assessed and assured. Three essential components are required by the law: the Individualized Education Program (I.E.P.), related services, and special education appropriate to the handicapping conditions of the child.

Handicapping conditions covered under P.L. 94-142 include "mental retardation, hard-of-hearing, deafness, speech or language impairment, visually handicapped, seriously emotionally disturbed, orthopedically impaired, or other health impaired children, or children with specific learning disabilities, who by reason thereof require special education and related services."

P.L. 93-112, the Rehabilitation Act of 1973

The Rehabilitation Act of 1973, Section 504 (29 U.S.C. § 794), guarantees handicapped persons access to buildings, transportation, appropriate housing, education, employment, and information. The law provides that "no otherwise qualified handicapped individual in the United States shall, solely by reason of his handicap, be excluded from the participation in, be denied the benefits of, or be subjected to discrimination under any program or activity receiving federal financial assistance."

P.L. 100-407, the Technology-Related Assistance for Individuals with Disabilities Act of 1988

The Technology-Related Assistance for Individuals with Disabilities Act of 1988 requires that the Department of Rehabilitative Services shall be the lead agency for the implementation of P. L. 100-407. The Department is required to study ways to assist all disabled individuals in becoming independent. Grants of \$500,000 per year for no more than three years will be awarded to localities and other appropriate parties for the assessment of consumer needs for assistive technology and for the development of methods to disseminate information on available resources to disabled persons, their families, other caregivers, agencies, advocacy groups, and organizations.

The passage of P.L. 94-142 and P.L. 93-112 signaled an end to discrimination against the handicapped in this country. The passage of P.L. 100-407 ensured that the continued commitment of government to assist handicapped persons toward self-sufficiency by providing the assistive technology necessary to enable them to function independently. The broad scope of the federal legislation has involved all segments of the population in upgrading and improving services to the handicapped. Through the planned construction of new facilities to accommodate the handicapped, architectural modifications to existing public buildings receiving federal funds, the adaptation of transportation, recreational facilities, housing, and medical technology, increased educational opportunities, and changes in employers' and the public's attitudes toward the handicapped, persons with an array of disabilities are now able to live more independent lives.

The Joint Subcommittee also reviewed the status of S. 933, Americans With Disabilities Act, which was recently passed by Congress. One purpose of this law is to end discrimination on the basis of disability. It is anticipated that the law could result in reduced federal expenditures of an estimated \$57 billion annually for disability benefits and programs. The bill has passed the United States Senate and has the support of the Bush Administration. It also has received wide support from numerous advocacy groups for the disabled. The Joint Subcommittee received an analysis of the provisions of S. 933 and a summary of the differences between it and the Commonwealth's Virginians With Disabilities Act by the Department for the Rights of the Disabled. It was noted that the passage of S. 933 may require changes in State law.

The Provisions of State Law

Virginia has contributed to this revolutionary process with the enactment of laws which parallel the federal statutes.

Article 2 (§ 22.1-213 et seq.) of Chapter 13 of Title 22.1 of the Code of Virginia - Special Education

In Virginia, handicapped children are entitled to special education at public expense from the age of two to twenty-one, inclusive. Such children may be "mentally retarded, physically handicapped, seriously emotionally disturbed, speech impaired, hearing impaired, visually impaired, multiple handicapped, or other health impaired including autistic or who have a specific learning disability or who are otherwise handicapped as defined by the Board of Education, and who because of such impairments need special education."

The Code of Virginia also includes the following provisions relative to the education and related services provided to handicapped children in the Commonwealth:

Interagency Coordinating Council on Delivery of Related Services to Handicapped Children is responsible for coordinating the delivery of services to handicapped children, birth through twenty-one; developing and implementing an interagency state plan for the provision of such services; initiating cooperative arrangements at the local level; receiving comments and recommendations from the local public service agencies, private providers, and citizens concerning problems in service delivery to handicapped children; designing strategies to mediate such problems; monitoring changes in programs and delivery of services in order to provide services that are needed and to prevent duplicative or unnecessary services; developing a strategy for meeting the anticipated educational and vocational needs of handicapped children aged fifteen or over; and for identifying existing barriers to a successful transition from special education to adult life.

Interagency Assistance Fund for Noneducational Placements of Handicapped Children is the Fund established within the Departments of Education, of Corrections, and of Social Services to provide payment of tuition, required related services, and living expenses for handicapped children placed by local social services departments or the Department of Youth and Family Services in private residential placements, special education facilities, or across jurisdictional lines in public schools while living in foster homes, child-caring facilities, or private, special education day schools if the I.E.P. indicates such school is the appropriate placement.

Interdepartmental Council on Rate-Setting for Children's Facilities establishes uniform policies and procedures for reviewing the costs of services; establishes uniform rules for allowable costs consistent with relevant laws and regulations; establishes uniform guidelines for calculating and granting waivers of and exceptions to the maximum percentage increase, including the use of advisory review panels; supervises the formulation and dissemination of a comprehensive list of all relevant institutions and facilities in the private and public sectors, the programs available, and costs in each; and establishes training requirements and qualifications for hearing officers.

Interagency Coordinating Council on Housing for the Disabled provides and promotes cross-secretariat interagency leadership for comprehensive planning and coordinated implementation of proposals to increase use of existing low-income housing for the disabled and to ensure development of accompanying community support services.

Title 51.5, Code of Virginia

Title 51.5 provides a plan of cooperation between the various state agencies which serve persons with disabilities, as well as relevant definitions. It is the policy of the Commonwealth "to encourage and enable persons with disabilities to participate fully and equally in the social and economic life of the Commonwealth and to engage in remunerative employment." To facilitate this policy, the General Assembly has enacted laws which:

- Provide relevant definitions, such as "person with a disability," to clarify who is eligible to receive services, the rights of the disabled, the goal of the plan of cooperation for the promotion of fair and efficient provision of rehabilitative and other services to persons with disabilities, and the budgetary commitment under the plan.
- Define "developmental disability" as a severe, chronic disability of a person which is attributable to a mental and/or physical impairment, occurs before age 22, will continue indefinitely, and results in substantial functional limitations in three or more of the major life activities of self-care, receptive and expressive language, learning, mobility, self-direction, capacity for independent living, and economic sufficiency, and which requires individualized lifelong or extended services.
- Establish the Board of Rehabilitative Services and the Board's powers and duties, which include the authority to promulgate regulations and establish fees for services, standards governing the rights of clients, and cooperative agreements with community services boards and schools, and the responsibility to maintain a registry of all head and spinal cord injuries.
- Establish the Department of Rehabilitative Services and the Department's powers and duties, which include its designation as the state agency for cooperating with the federal government in carrying out the provisions and purposes of the federal Rehabilitation Act of 1973; authorize the Department to cooperate with the federal government in the administration of such act, administer federal funds, receive gifts and donations, and donate equipment which has depreciated to a value of zero; authorize it to engage in certain activities to promote the elimination of environmental barriers and establish criteria for vocational rehabilitation services; and give it the responsibility for implementing and administering the Long-Term Rehabilitative Case Management System which provides coordination of medical, psychosocial, vocational, rehabilitative, long-term care, and family and community support services for persons with functional and central nervous system disabilities.

- Designate the Commissioner of the Department as its supervisor and establishes his powers and duties which include the operation and maintenance of Woodrow Wilson Rehabilitation Center.
- Authorize grants for community services such as independent living centers and determine requirements for such services and centers, employer projects, and eligibility criteria.
- Establish the Board for Rights of the Disabled, its meeting requirements, and its powers and duties and provide the Board with the authority to employ staff.
- Establish the Department for Rights of the Disabled and its powers and duties; designate the Department as the agency responsible for protecting and advocating for persons with disabilities pursuant to federal law, and authorize the Department to enter into cooperative agreements with other state agencies providing similar services.
- Establish the Rights of Persons with Disabilities Act, which prohibits discrimination against persons otherwise qualified in programs receiving state funds, including educational institutions; prohibits discrimination by employers except those covered by the federal Rehabilitation Act of 1973; prohibits discrimination in exercising the right to vote, in general public accommodations, public transportation, and acquiring housing; provides the right to injunctive relief, compensatory damages, and attorneys' fees in successful actions.

■ **Services Available to Disabled Persons Through State Agencies in Virginia**

Department for the Aging primarily serves as a coordinator of services. However, two services are delivered, i.e., investigating complaints about care received in homes for adults, nursing homes, and state hospitals administered by the Department of Mental Health, Mental Retardation and Substance Abuse Services (the long-term care ombudsman program) and complaints about care received in community-based services "designed to provide long-term care" which are delivered by various state agencies, area agencies on aging, or any other agency. It maintains a toll-free line for information on various services and programs available to older Virginians.

Department for the Deaf and Hard-of-Hearing serves primarily as an information network and coordinator of services for the deaf and hard-of-hearing. In the last several years, the Department has also actively assisted individuals in obtaining TDD communication aids.

Department of Education regulates all special education programs in local education agencies as well as special education provided through state agencies such as the Department of Mental Health, Mental Retardation and Substance Abuse Services, local detention centers, and certain acute care facilities. The Department also provides administrative oversight and technical assistance to the Schools for the Deaf and Blind at Staunton and Hampton which deliver direct, day and residential education services to deaf, blind, and multi-handicapped children.

Department of Health is a centralized state agency which operates all local and district health departments in the Commonwealth, with the exception of one which is required by law to adhere to all of the statutory requirements. The Department has special programs for reduction of infant mortality and morbidity, such as Maternal and Child Health Services, Child Development Services, and Children's Specialty Services.

In addition, the Department provides testing, treatment, and nutritional services to children with certain congenital diseases causing disabilities as set forth in the law, operates a pilot program of hospice for dementia patients in the Tidewater area, and is currently seeking to develop a primary health care system which would provide health care to under served areas and populations.

Department of Housing and Community Development assists in protecting the safety of persons with disabilities through promulgating regulations pursuant to the Statewide Uniform Building Code, e.g., fire suppression systems, alarm systems, and standards for doors, stairways, etc. The Department also administers many grant and loan programs for financing housing, including housing specifically designed to serve persons with disabilities.

Department of Medical Assistance Services implements the Medicaid program for Virginia and now also has responsibility for administering the State/Local Hospitalization Program which is a program for indigent persons who are not eligible for Medicaid. Medicaid in Virginia is available to two classes of individuals, e.g., the medically needy and the categorically needy. A wide range of services are provided by Medicaid, including hospitalization, primary care, and pharmaceuticals. The Department also operates certain waiver programs including personal care services, respite care, adult day care, and a program for ventilator dependent children. There are limitations on these services, for example, reimbursement for acute care for adults is limited to 21 days per admission.

Department of Mental Health, Mental Retardation and Substance Abuse Services delivers direct, residential services to individuals with mental disabilities, mental illnesses, and chemical dependencies. The Department also monitors the activities of and cooperates with the community services boards (CSB's) throughout the Commonwealth. The CSB's deliver a range of services on the community level for individuals with emotional and mental disorders including substance abuse services.

Department of Rehabilitative Services administers federal funds for rehabilitation of persons with disabilities and performs the following services: maintains the central registry of persons with spinal cord injuries and brain injuries; evaluates persons with disabilities for vocational rehabilitation potential; and provides counseling, guidance, referral, physical and mental rehabilitation services, and vocational training. The Department also establishes group facilities and sheltered workshops and conducts a limited program of case management. The Woodrow Wilson Rehabilitation Center, a residential facility providing vocational training and health services to persons with a wide range of disabilities, is included within this Department. At this time, the Center is focusing on developing a program for those with head injuries.

Department for the Rights of the Disabled is designated as the agency responsible for protecting and advocating for persons with disabilities pursuant to federal and State law. The Department conducts investigations of abuse, resolves disputes, operates an information and referral service, and provides outreach and training. It has served an important role in recent years as a facilitator for promoting understanding and cooperation among and between advocacy groups.

Department of Social Services administers programs of social services which are implemented on the local level, such as general relief, child and adult protective services, and foster care. The Department also licenses homes for adults, child-caring institutions, and day care facilities and monitors the interstate compact for placement of children. An important function for persons with disabilities conducted by the local departments of social services or welfare is the determination of eligibility for Medicaid.

Department for the Visually Handicapped administers various programs for blind and visually handicapped individuals, such as vocational rehabilitation and facilitating financing of education, library, and employment services and diagnostic and vision evaluation. The Virginia Rehabilitation Center for the Blind provides vocational rehabilitation and training.

■ **Needs of the Physically Handicapped**

Affordable, accessible, and safe housing, increased public transit services with necessary modifications, transportation for fixed public transit routes and paratransit services, accessible buildings, and attendant or personal care assistance services are critical needs of handicapped individuals. The lack of affordable, accessible and specially-equipped transportation services is a particular concern to the physically handicapped, as such services are vital to their full participation and integration in the community. However, there are many areas in the Commonwealth where public transit does not exist, and many handicapped individuals must rely on community-based services for their transportation needs. With the exception of handicapped persons who own specially-equipped vehicles that enable them to drive, physically handicapped persons must live within reasonable distance of the limited number of bus routes which utilize handicapped-accessible, paratransit vehicles. Many of these transportation services are dependent on federal funds; however, reduction in such funding has resulted in the need for increased funding by local governments. Unfortunately, due to escalating operation costs, several localities have reduced or eliminated the paratransit systems for the physically handicapped and in other jurisdictions, paratransit systems are threatened by the loss of local funds. This situation is exacerbated by the inability of most physically handicapped persons to pay higher fees for transportation services.

Testimony presented to the Joint Subcommittee indicates a need for the Commonwealth to be an active participant in helping handicapped individuals become independent. It was noted that the needs of the disabled elderly and deaf and hearing-impaired citizens, particularly children and deaf adults who are rearing children, are grossly underserved. There is also a great need to develop incentives to encourage handicapped persons to seek employment, to teach social skills to individuals who were born with a disability or who have been subjected to

long-term institutionalization, to make public buildings and facilities barrier-free, to create more durable medical equipment, and to provide respite care services for the families and caregivers of handicapped citizens. The provision of these services would do much to improve the lives of handicapped individuals.

■ ***Personal Assistance Services***

Often, because of the very nature or severity of the injury to the central nervous system, some individuals do not fully recover or regain their cognitive skills and mobility and thus may be totally dependent upon others to provide care or may require assistance with routine daily personal care. Personal assistance services include assistance with shopping, reading, writing, bill paying, and related supportive activities. Many handicapped persons discover that after discharge, they are virtually on their own and that personal assistance services can be quite difficult to obtain. Currently, the personal assistance services delivery system is based on a medical model rather than a social services model.

The Joint Subcommittee determined that the eligibility criteria for personal assistance services severely limits the access of such persons to these services, as the health or income of the individual are insufficient indicators of the need for personal assistance services. Unfortunately, due to the criteria, the individual must remain "homebound," that is, he must remain at home and in bed in order to receive any benefits. This situation is exacerbated when the individual is not eligible for Medicaid and Medicare. The Joint Subcommittee was advised that the delivery of personal assistance services through the medical model inhibits the provision of such services to persons who are most in need, does not meet the needs of individuals who do receive such services, is insufficient to meet present demands, and does not allow the individual to exercise control over his own life. The availability of personal assistance services to the handicapped is crucial to their obtaining independence.

■ ***Lack of Rehabilitative Care Facilities***

Rehabilitation is a long, continuous struggle. Testimony submitted to the Joint Subcommittee indicates a need for additional rehabilitation facilities and that insufficient levels of long-term care and complex regulations thwart the delivery of services to citizens who need them. Increased availability and accessibility of rehabilitative facilities would enable many patients to be served closer to their homes and on an outpatient basis. Rehabilitation programs must provide all levels of patient care and a systematic approach to rehabilitative care may not be appropriate in all cases to deliver concentrated and personalized care that meets the needs of the individual.

It is important to note that traumatic brain injury is not recognized by all rehabilitation, insurance, and public assistance programs as a disability, leaving many such persons to face the difficulty of trying to qualify for and receive the limited benefits available from various health and social programs. For some individuals with traumatic brain injury, rehabilitation may include learning new skills in order to return to work. Some rehabilitative programs include testing of head injured individuals for job suitability; however, there is great concern about

the appropriateness of testing such persons because certain jobs which are identified through testing as appropriate for head injured citizens are, in actuality, inappropriate for these persons. Although some head injured persons are able to return to their jobs, many are successful in obtaining only temporary employment and must often face the humiliation of not being re-contacted when employers learn of their disability. Because there is no support mechanism for persons suffering from head injury, many of these persons do not reach their full potential for independence and productivity. It was suggested to the Joint Subcommittee that a special commission be formed external to the Department of Rehabilitative Services and the Virginia Employment Commission to assist head injured citizens in locating and securing appropriate employment.

Among the recommendations for providing rehabilitation services to head injured persons that were presented to the Joint Subcommittee was the Elli Ross Revitalization Center model. The Center model would assist people who have special needs as a result of a catastrophic illness in cultivating independent living skills. This model would be expandable to serve all Virginians through the utilization of volunteers and professionals. It would have the potential to strengthen families; improve the health of the individual, family, and community; reduce social isolation and dependency; and make preventive and primary care more accessible.

Approximately 503,000 people in the United States have suffered spinal cord injury. Many of these persons were paralyzed as a result of car crashes, diving accidents, gunshot wounds and domestic violence. The costs of care for spinal cord injury are tremendous and may amount to thousands of dollars per day for the initial hospitalization, physician's and specialist's fees, rehabilitation hospitalization, physical therapy, home modifications, specialized equipment, and personal assistance services. Spinal cord injury is one of the most expensive medical problems in the State and the nation. One of the most critical public policy issues concerning the care of these citizens is how to address the needs of aging spinal cord injured citizens effectively and efficiently. Problems faced by these individuals include the lack of available health care, the need to educate hospitals in the proper care and treatment of spinal cord injuries, and access to services when they become unable to care for themselves. Prior to their injury, many of these citizens were gainfully employed and independent and, therefore, do not wish to have it appear that they are living off society or are requesting special entitlements in conveying their need for assistance. Persons who addressed the Joint Subcommittee noted the need for personal assistance services, tax reductions to help improve the quality of life of aging spinal cord injured citizens, greater acceptance of spinal cord injured persons in retirement communities, long-term care, and transportation services which promote some measure of independence. It was noted by several persons that neural injury and regenerative research also are needed. Such research may not help those already injured, but it has the potential of reducing the long-term effect of such central nervous system injury for those persons who may suffer traumatic brain or spinal cord injury in the future. It was recommended to the Joint Subcommittee that a facility to meet the specialized needs of elderly, spinal cord injured citizens be established in Virginia.

Funding of rehabilitation services for persons with disabilities is a perpetual problem. Because many persons sustain traumatic brain injury as a result of automobile accidents, often involving collisions with a drunk or reckless driver, some states have implemented legislation which authorizes the court to impose an additional fine for drunk driving convictions. Such funds are designated for use in head injury rehabilitation programs. This approach to providing funding for rehabilitation and regenerative research for central nervous system disabilities was proposed to the Joint Subcommittee. It was further advised that adequate funding for appropriate rehabilitation services for all handicapped persons and the removal of bureaucratic and discriminatory barriers would enable them to become productive and successful citizens, thereby relieving the Commonwealth of the burden of providing expensive public assistance.

There is a particular need for greater dissemination of information about available resources and services to all handicapped persons and their families. Information provided to the Joint Subcommittee indicates that, too often, handicapped persons and their families, particularly the head and spinal cord injured, are unaware of various program benefits, resources, and services, or some have remained at home indefinitely without proper follow-up medical care and rehabilitation services. Failure to receive appropriate care and services exacerbates their disability, may impede full recovery and rehabilitation, results in recurring costly medical care for hospital re-admissions, increases the costs of social programs, and deprives society of the benefit of the talents and abilities of contributing citizens. For many such individuals, their success in becoming once again a productive, self-sufficient individual was made possible only through the efforts of a strong family, a support network of friends, and the knowledge of available resources and services. It was suggested to the Joint Subcommittee that it explore the feasibility of providing resource and referral centers as a means of facilitating the dissemination of information and that the facilities of the public library system be considered as possible sites for such centers.

Other problems concerning the level of rehabilitative care and related services available for handicapped persons in Virginia include: (i) the lack of access to extensive rehabilitation for patients under age sixty-five; (ii) the lack of health insurance or ineligibility for public assistance which causes many of handicapped individuals to "fall through the cracks"; (iii) limited reimbursable insurance coverage for rehabilitation; (iv) the scarcity of long-term care facilities for the severely disabled citizen and limited insurance coverage for long-term care; (v) insufficient insurance coverage for rehabilitative services and disposable medical equipment to enable the injured patient to achieve independence; (vi) the need for adequate training for persons with cerebral palsy to afford them greater independence; (vii) the need for adequate instruction in sign language for the deaf and hard-of-hearing to enable them to communicate with each other; (viii) instruction in Braille for the blind and visually handicapped, especially in the public schools for such students who are mainstreamed to better prepare them for interaction and immersion in society; and (ix) transportation services for the visually handicapped. Many advocates for the handicapped expressed concern that the needs of such persons be addressed without undue delay and that it would be unfortunate if these individuals become so integrated in the general population that they are unable to communicate among themselves. In addition, most

handicapped persons, regardless of their disability, face untold difficulties in dealing with the myriad bureaucracies within society, including the judicial system, employment agencies, and social services.

■ *Insurance*

The Joint Subcommittee deliberated at length on the problems associated with the availability of insurance and covered services for the handicapped. It conferred with the Bureau of Insurance, Blue Cross/Blue Shield, one of the largest insurance carriers in the nation, and an insurance specialist at the National Head Injury Foundation concerning these issues.

At the request of the Joint Subcommittee, the Bureau of Insurance investigated the availability of insurance coverage in Virginia for central nervous system disorders and reviewed accident and sickness insurance policies issued in other states to determine whether coverage for head and spinal cord injuries are mandated services. The Bureau reported that coverage for these injuries is not a mandated benefit under Virginia insurance law, but people may obtain such coverage through the purchase of individual policies. After reviewing a sample of policies written in Virginia, the Bureau found that some policies include coverage for occupational therapy, speech therapy, and convalescent and skilled nursing care. Many policies do not contain provisions for rehabilitative care, and some disability policies cover only educational services. It noted that long-term care policies are just developing and are not yet available in Virginia. The Bureau was asked to compare Virginia's mandated benefits with other states to determine whether other states mandate coverage for central nervous system disorders. The Bureau found in its review of policies issued out-of-state that a few states require coverage or require that coverage be offered for temporomandibular joint disorder and phenylketonuria, but none require coverage for head and spinal cord injuries. A majority of states do not include rehabilitation services among mandated services or among those for which coverage must be offered, although some carriers do provide limited coverage for physical and educational rehabilitation to help the insured become a wage earner again. Representatives of the Bureau of Insurance informed the Joint Subcommittee that certain of the proposals relating to insurance issues which were submitted for its consideration would involve a mandate by the General Assembly to the insurance industry to implement the proposals. The Joint Subcommittee was requested to delay action on the proposals until a review and analysis of their social and economic impact could be conducted.

Blue Cross and Blue Shield was requested to review the company's policy regarding the coverage of head and spinal cord injuries and the physically handicapped. Company representatives noted that the claims review process utilizes the managed benefits program for inpatient stays. A common provision applied to all coverage is that of medical necessity to determine whether the services or supplies provided are required to identify or treat a subscriber's illness or injury. There are no specific distinctions in deductible requirements, copayments, or maximum dollar limits, with the exception of the KeyCare Plan, which is the health care insurance program that utilizes a preferred provider network. Under the Plan, coverage of outpatient rehabilitation services is limited to sixty days of care per benefit period. There are no special reimbursement restrictions imposed on out patient rehabilitative care separate from conditions or exclusions which are imposed on outpatient treatment

generally. However, some contractual exclusions that apply to rehabilitation services include custodial or residential care, educational or social services, personal hygiene and convenience items, pre-existing conditions and services which are experimental or investigative in nature. Excluded from coverage are treatment for autism, hyperkinetic syndromes, learning disabilities, behavioral problems, mental retardation, and hospitalization for environmental change. Blue Cross and Blue Shield does, however, provide coverage for the mentally ill and handicapped dependent children over age twenty-three. The company is currently studying the feasibility of offering long-term care policies for the physically handicapped.

The insurance specialist at the National Head Injury Foundation advised the Joint Subcommittee that insurers will not reimburse the costs of medical care for traumatic brain injury unless the insurance contract for hospital and outpatient care includes mental health services. Most insurance carriers do not provide coverage for rehabilitation services in their policies, and many policies include provisions concerning pre-existing conditions and waiting clauses which effectively limit the access to medical and rehabilitative services. The following initiatives were proposed as means to provide insurance coverage of medical care for handicapped persons:

- Require rehabilitation and case management as mandated services in health insurance policies.
- Require that health insurance policies include broader coverage for outpatient care and provide coverage for neuropsychological services.
- Require that disability insurance cover rehabilitation costs.
- Require that all insurance carriers offer catastrophic riders.
- Require insurance policy exclusions for rehabilitation costs be prohibited.
- Amend the Code of Virginia to include rehabilitation facilities in the definition of hospital.
- Prohibit insurance companies from defining traumatic brain injury as a nervous or mental disorder.
- Prohibit minimum policy benefits.
- Require insurance companies to limit pre-existing conditions and waiting period clauses.
- Amend the Code of Virginia to provide no-fault insurance for motor vehicles.

After its review of issues related to the availability of insurance for the handicapped, the Joint Subcommittee determined that although there are gaps in coverage for head and spinal cord injury, the provisions of the insurance contract are key to the services that will be covered. It determined that because many handicapped persons are uninsured or have exhausted their benefits, they do not

receive needed medical care and support services. This is particularly true among persons with head and spinal cord injury. Essentially, persons with a neurological impairment such as traumatic brain injury must be classified as mentally ill to receive coverage and reimbursement for the costs of medical services under their insurance plan. Because such individuals are not mentally ill, medical care and treatment which would be appropriate for this disability are not covered services. The classification of traumatic brain injury within the category of mental illness for insurance purposes contributes to the lack of insurance and covered services for head injured persons.

It was proposed that persons who have a primary medical diagnosis of neurologic trauma and subsequent neural, behavioral, and cognitive related problems receive appropriate and prescribed care that is reimbursable under routinely covered medical services rather than under mental health care services, and that head injury be redefined and reclassified within reasonable limits to prevent the escalation of insurance costs.

■ **Low-Level Functioning and Behavioral Treatment Programs**

Statistics from the National Head Injury Foundation indicate that there are 70,000 to 90,000 head injuries in the United States each year which result in coma or extreme loss of body functions. In Virginia, there are at least 1,000 such cases each year. Most traumatically brain injured persons go through some stage of coma or vegetative state; however, whereas some patients regain consciousness, many others do not. A recent study by the Virginia Head Injury Foundation on the needs of low-level functioning head injured persons and the need for behavioral treatment programs revealed that of the nursing homes surveyed, fifty-one percent of their head injured patients were in comas or were low-level functioning patients who require intensive care and comprehensive rehabilitation services. One-half of the nursing homes that responded have at least one head injured patient.

Ethically, services must be provided these persons, but appropriate services may not be available. Experts in the care of persons with traumatic brain injury agree that individuals at lower levels of functioning who do not meet the criteria for acute rehabilitation, need and can benefit from comprehensive long-term services specifically designed to meet their needs. Long-term care of low-level functioning head injury survivors and behavioral treatment programs must provide a continuum of care that includes maintenance care for patients who are comatose and for patients who face severe memory loss and behavioral problems. Low-level functioning patients should be afforded additional opportunities for further rehabilitation; however, there is insufficient information to determine the types and costs of specialized services they require and the most effective manner of providing such services. To rectify the dearth of information needed to develop appropriate services for such patients, an effort is underway by the Virginia Head Injury Council to survey all nursing homes, hospitals, and families of head injured persons to obtain quantitative data on the number of low-level functioning individuals and to identify the type of services that they require and receive. At present, the low-level functioning patient's need for extended rehabilitation is hampered by the refusal of third-party payors to reimburse the costs of further rehabilitation if such patient has previously received such treatment.

Virginia is currently in a crisis situation to find placements for comatose and low-level functioning patients because there are no subacute health care facilities in the Commonwealth. To address this dilemma, the Joint Subcommittee was advised that American Rehab Centers, Inc., a private nationwide company which provides cost-effective programs for traumatically brain injured patients for whom an acute care rehabilitation unit or a skilled nursing facility is inappropriate, is negotiating an affiliation with the Medical College of Virginia Brain Injury Rehabilitation Service Division to develop appropriate services and to manage an Early Recovery Management Program in Virginia for such patients. It was proposed that the Joint Subcommittee further consider the need for and the benefit of establishing subacute units for traumatically brain injured persons in Virginia.

Injury to the human brain threatens the most profound and complex functions, diminishing a few or many physical and cognitive functions temporarily or permanently, and minimally or extensively. Trauma to the brain may affect the areas that control behavioral, cognitive, and physical functions, or the balance among these functions may be disrupted. Fifty-two percent of head injured persons who are institutionalized have behavior problems which need treatment. The prognosis for victims with severe head injury is usually very poor, and those with minor head injury may also experience significant and long-term debilitating effects. Some such effects of severe head injury include psycho-social-behavioral-emotional impairments which may be manifested in some persons as (i) serious behavioral problems of a violent or aggressive nature which places them and others at risk; (ii) behavior problems which interfere with their successful rehabilitation, job placement, or community reintegration; and (iii) high-risk behavior and other behavioral problems which result from neurological damage and family or group dynamics.

The Joint Subcommittee reviewed the proposal of one locality's demonstration projects for long-term care of low-level functioning head injury survivors and behavioral treatment programs. The model programs include case management as an essential component and the staff is instructed on case management procedure as part of the training process. The programs' clients will be phased-in gradually until the program reaches maximum capacity. Because the programs will be unable to serve all individuals needing services, managing the programs' caseload will be an important factor to ensure a mix of cases rather than an entire caseload of crisis cases, which could result in personnel burnout, and the establishment of priorities to deliver effective case management services.

It was noted that the modest budget for the behavioral treatment program may be insufficient to design the program and secure the services of a neuropsychologist in view of the shortage of such specialists and the high costs for their services. Although there are a variety of clinical approaches which may be used successfully to treat such individuals, no one clinical approach will meet the needs of all head injured persons with behavioral problems. Considerable work is needed to determine the optimal means of delivering behavioral treatment services and how existing resources can be most effectively combined to provide such services. The Joint Subcommittee was asked to consider recommending that facilities to care for low-level functioning head injury survivors and to provide behavioral treatment programs be established in Virginia. It was also requested to

develop, with the assistance of a neuropsychological consultant, a program design which reflects the most recent research and effective modalities in treating behavioral problems, identify the least restrictive environment in which behavioral treatment services may be provided, and establish the Department of Rehabilitative Services as the lead agency in the implementation of a behavioral treatment program to ensure that the program is coordinated with the case management system and with existing programs, funding, and services provided by other state agencies.

■ Pediatric Traumatic Brain Injury

Although children who are traumatically brain injured share impairments similar to those of other handicapped children, they do have unique needs. Among their most crucial needs are early identification and appropriate educational services.

Children with traumatic brain injury often suffer from inadequate educational services because this injury is not recognized as a handicapping condition, and educational services specifically designed to meet the needs of such children are not available in public schools. Educational programs at the early childhood and elementary levels and for adolescents are particularly poor. The lack of appropriate educational services is exacerbated further by inflexible scheduling, an inappropriate curriculum to accommodate learning deficits, misdiagnosis and inappropriate placement in special education classes, and the need for teacher training in the identification of such children and the development and use of innovative instructional strategies to provide appropriate learning experiences.

The need for appropriate educational services for traumatically brain injured children was documented by a Vermont study which revealed that ninety-four percent of educators have not heard of traumatic brain injury. The experience of one family in providing an education for their daughter was brought to the Joint Subcommittee's attention to illustrate the typical problems which such families face and the effects of inappropriate educational services.

The Joint Subcommittee was informed that although the school was advised of the child's head injury and her cognitive deficits, she was inappropriately placed initially at grade level and received regular instruction. Because of her cognitive deficits, her academic achievement began to fall below grade level. At her mother's request for modifications in her instruction to accommodate her learning needs, she was subsequently placed in a special education class. This placement, likewise, was equally inappropriate because the instruction was designed to meet the needs of students who were mentally retarded. Upon the request for an instructional program designed to meet her daughter's needs, the mother was advised that the school was unable to provide such services for one student and that her daughter could remain either in the special education or regular classroom. During the period in which the family tried to obtain appropriate educational services, they were also confronted with the need to deal with her very low self-esteem due to her school situation and the devastating emotional and psychological stress on the family because of their daughter's negative school experiences. The family was advised by their daughter's

physician to obtain psychological services for her but was unable to do so because the family's insurance does not cover therapy. Faced with the decision of whether to allow their daughter to remain in school, albeit the school's inability to meet her unique educational needs, and the need to ensure her continued well-being, the family elected to withdraw her from school.

The experiences of this family are typical of those of many others and demonstrate the need to educate and sensitize school officials as well as teachers to the educational needs and problems of traumatically brain injured children. It was recommended that the Virginia Head Injury Registry be utilized to ascertain the epidemiology, etiology, and demographic characteristics of pediatric head injury victims and to make referrals for appropriate treatment and services.

■ Traumatic Brain Injury and Maladaptive Behavior

More recently, increased attention has been devoted to the causes of violent criminal behavior. Questions have been raised concerning the predictors of violent behavior. Dorothy Otnow Lewis, M.D., a renowned professor of psychiatry and pre-eminent investigator in the field of central nervous system trauma and violent behavior, stated in her paper, *Intrinsic and Environmental Antecedents of Adult Violent Criminality: A Follow-Up Study of Incarcerated Delinquents*, that "[I]t is well established that violence in childhood is associated with later violence. As a variable, however, early aggression can only predict, but does nothing to help understand the causes, treatment, or prevention of adult violence. While nearly all very violent adults appear to have been violent as juveniles, many violent juveniles do not become violent adults. The research in this area indicates that (i) children who are neuropsychiatrically and cognitively intact are better equipped than are multiply handicapped children to resist models of aggressive behavior, choose among alternative lifestyles, and make independent, more rational judgments regarding appropriate behavior; (ii) abuse engenders rage, the kind of rage that neuropsychiatrically and cognitively impaired individuals find far more difficult to control than do normal, nonimpaired, healthy individuals; (iii) when abuse involves shaking, battering or other injury to the central nervous system, it creates psychiatric, neurological and cognitive vulnerabilities; and (iv) neuropsychiatrically impaired children, by virtue of their hyperactivity and impulsivity, invite abuse."

The data suggests that the combination of psychiatric, neurological, and cognitive vulnerabilities and abusive environments, e.g., physical and sexual abuse in childhood and early adolescence place youth at greater risk of becoming violent adults. As a result of assessments that Dr. Lewis conducted of juveniles on death row in the United States, it was determined that most of them shared an extensive history of family abuse, psychotic symptoms and neurological disorders, severe accidents as children, and injuries to the central nervous system, particularly head injury, which had not been previously identified by physicians, probation staff, attorneys, prosecutors, or other persons associated with the cases.

Given the implications of the data and the research conducted by Dr. Lewis, court services staff in one Virginia locality developed an assessment instrument to assist practitioners in identifying such problems among juvenile clients and in comparing the information with data previously obtained from social histories and psychological examinations. It was determined that among those juveniles charged with crimes against the person, practitioners and court service staff identified histories of trauma which were previously undetected. As a result of these findings, the court services unit for the juvenile and domestic relations district court instituted training programs for law enforcement agencies, court services staff, and judges in order that they might be made aware of the association between central nervous system injuries and delinquent behavior, that such injuries and behavior often occur together with other problems, the need for a more thorough evaluation of juveniles upon their entrance into the juvenile justice system, and of appropriate medical interventions which might be valuable.

In view of these findings, it was requested that the Joint Subcommittee encourage continued research on the association between central nervous system injuries and the propensity for violent behavior, training of court services personnel and youth services agencies concerning these issues, and an assessment of the implications of these findings on the juvenile justice and correctional systems, on appropriate disposition of individual cases, and on handling violent youth in the juvenile justice system.

■ **Inappropriate Placements for Traumatically Brain Injured Persons**

The diagnosis, testing, and placement of traumatically brain injured patients must be appropriate to the medical condition of such individuals. Testing must be thorough and specific in order to avoid misdiagnosis because failure to recognize structural damage and behavioral change can result in inappropriate treatment. The Joint Subcommittee, during the first year of its study, was informed that, too often, persons with traumatic brain injury are misdiagnosed and inappropriately placed in state mental health facilities. To determine the extent of this problem, the Joint Subcommittee requested the Department of Mental Health, Mental Retardation and Substance Abuse Services to identify such patients. In response to this request, the Department presented an overview of its programs on identification, placement, and treatment of patients with central nervous system disorders but advised that it has not yet determined how many patients there are with traumatic brain injury in its institutions or whether any of the patients may be served better in other treatment facilities. One component of the Department's study focuses on the ongoing problem of the misdiagnosis of brain injury as mental illness and the review of new patient admissions records to identify persons who have been misdiagnosed and inappropriately placed. The Department has requested \$50,000 in its 1990 budget to conduct a systematic and more thorough review of all patient records to identify the number of traumatically brain injured patients in its institutions and to determine whether they might be more appropriately served by other facilities. In addition, it was noted that communication between the Department of Mental Health, Mental Retardation and Substance Abuse Services and the Department of Rehabilitative Services is evolving and that efforts are directed towards a cooperative and collaborative relationship to facilitate the delivery of coordinated services to persons served by both Departments.

■ Medical Assistance Services for the Handicapped

Virginia's Medicaid budget for the current biennium is \$1.96 billion and the costs associated with the program are projected to exceed \$2.1 billion for the next biennium. Proportionately, more money is spent on the disabled than any other category in the Medicaid budget. However, in view of the numerous concerns expressed by many handicapped persons regarding the difficulty in obtaining payment for certain types of care through Medicaid, the Joint Subcommittee requested the Virginia Department of Medical Assistance Services to prepare a brief summary of the purpose, eligibility criteria, and covered services of the program for its review. The Department reported that the Medical Assistance Program, Title XIX of the Social Security Act, was enacted by Congress in 1965 to provide medical assistance to eligible indigent persons. The program is funded by federal and state money, and federal regulations for the program allow states flexibility in designing their own program within established guidelines. All Medicaid benefits are based on medical necessity and eligibility criteria are established within the limits allowed under federal law. Aged, blind, and disabled persons are eligible for Medicaid if they are eligible for Supplemental Security Income or if their income and resources fall within the Medicaid limits. Medicaid regulations also place constraints on the types of services that will be delivered and the level of reimbursement for covered services.

Covered rehabilitation services are those that are medically prescribed treatment for improving or restoring functions that have been impaired, or permanently lost or reduced by illness or injury to increase the individual's ability to perform those tasks required for independent functioning. However, evaluation and/or rehabilitative training solely for vocational or educational purposes or for developmental or behavioral assessments are not covered services.

Persons who are eligible for Medicaid may receive personal care services and home health services. Personal care services are long-term maintenance or support services which are necessary to enable the individual to remain at or return home rather than enter an intermediate or skilled nursing care facility. Home health services, which must be prescribed by the recipient's attending physician and included in the written plan of care, are provided by a certified and licensed home health agency on a part-time or intermittent basis to a home-bound recipient in his home.

Special care for ventilator dependent persons is provided under Medicaid as follows: (i) no limit on an acute care stay for children under age 21 and (ii) a 21-day stay per admission for acute hospitalizations for individuals over age 21. Currently, the Department is exploring the feasibility of increasing services to ventilator dependent persons, particularly extending the waiver for ventilator dependent children in order to serve more children; providing similar services available under the waiver for children to ventilator dependent adults; and providing special reimbursement for skilled nursing facilities which provide care to ventilator dependent persons.

Persons who are participating in a comprehensive inpatient or outpatient rehabilitation program or receiving home health services may have the costs of certain durable medical equipment and expendable supplies which have a diagnostic or therapeutic purpose, are recognized as medically necessary, and are prescribed by the physician, covered by Medicaid. Home renal dialysis equipment and supplies, respiratory equipment and oxygen, ostomy supplies, and prosthetic devices for upper and lower extremities are covered services for persons who are not participating in a rehabilitation program or receiving home health services. It should be noted that there are certain other supplies that are not covered by Medicaid under any conditions.

Medical case management services are being provided under the Virginia Medicaid Program for ventilator dependent persons and the disabled individual who requires rehabilitative and long-term care services that are not available in Virginia. The Department contracts for case management services necessary for ventilator dependent children in the home-based service waiver and for high risk pregnant women and infants up to age two.

Transitional living programs are uniquely developed programs which provide a continuum of rehabilitative services to address the needs of a targeted population. Such programs may include specialized services which stress cognitive, speech, and behavioral therapies. The programs are primarily residential and emphasize paraprofessional care with vocational training rather than medical rehabilitation. Because federal law requires that Medicaid services be medical or remedial, coverage of such programs are limited under Medicaid due to the nonmedical nature of the programs. Currently, the Department is reviewing options to provide services to individuals who require day treatment programs.

■ **Status of Legislation Enacted in 1989**

During the first year of study, the Joint Subcommittee requested, via resolutions passed by the 1989 General Assembly, certain agencies and professional organizations to become involved in providing or enhancing services to head and spinal cord injured persons, their families, and the public. During the second year of the study, the Joint Subcommittee requested each agency and organization to apprise it of the status of implementing the recommendations in the resolutions. The following is a summary of the status of those activities.

The Secretaries of Health and Human Resources, Transportation and Safety, and the Office of the Attorney General were requested pursuant to HJR 396 (1989) to examine, collaboratively, the issues concerning public awareness and the requirements of public safety laws as a means of preventing central nervous system injuries. A staff person from each agency was designated to represent the agency at meetings of the interagency work group that was established. Each agency representative apprised the group of programs administered by their respective agency concerning public awareness and education regarding seat belt, helmet, infant restraint, DUI, and other safety laws. The group reviewed the programs to identify gaps in services and to develop means to strengthen efforts to disseminate information on such laws to the public. A representative of the interagency work group reported to the Joint

Subcommittee that the proposed Virginia Prevention Plan includes strategies for reducing the number of head injuries in the Commonwealth by forty percent and fatalities caused by head injury. In addition, appropriate state agencies will also be requested to participate in a statewide publicity campaign that will emphasize education on personal safety as one means of lowering the rate of physically debilitating injuries in Virginia. One important feature of the campaign to target issues of public safety will be the distribution of a video to television stations throughout the Commonwealth for broadcast as a community service.

The Medical College of Virginia and the University of Virginia Medical Center were requested by HJR 392 (1989) to collaborate in the establishment of a regional telecommunications system to facilitate medical consultations on central nervous system disabilities between physicians in rural and urban metropolitan areas. Representatives of each institution met regularly to identify the needs to be served, develop program components, and project the costs of providing services and conferred with the Division of Emergency Medical Services to discuss training and other initiatives for EMS personnel in the proper treatment and emergency care of persons who sustain traumatic brain or spinal cord injury. The Medical College of Virginia and the University of Virginia Medical Center submitted a proposal for the implementation of a model regionalized telecommunications system for medical consultation. Components of the system would include (i) the identification of four community hospitals and their related emergency medical services support systems to participate with MCV and UVA as Head Injury Centers; (ii) the creation of a Trauma Communication, Coordination and Evaluation Unit in each Head Injury Center, and a Trauma Training and Education Unit in each academic health center; (iii) an improved and enhanced emergency clinical management system; (iv) the creation of a multidisciplinary, multihospital, rapid response system; (v) a prospective study and analysis of the early rapid response system; (vi) a retrospective study and analysis of brain and spinal cord injury patients to identify and correct problems related to early management; (vii) identification of needed modifications to existing transport emergency medical transport systems; and (viii) acute drug management research. It was noted that the proposed model has the great potential of serving many other communications needs for other medical conditions throughout the Commonwealth.

The Department of Rehabilitative Services was asked to provide an update on the implementation of the Long-Term Rehabilitative Case Management System which was created via House Bill 1486 by the 1989 General Assembly. The Department reported that \$250,000 was appropriated for the implementation of the case management system, and that a multi-agency advisory council has been established to provide guidance on the development of the system and the employment of case managers. The Department has also solicited the participation and perspectives of the Woodrow Wilson Rehabilitation Center, the Department of Medical Assistance Services, the Virginia Institution of Behavioral Disorders and other agencies in the planning process to obtain diverse views concerning the criteria for coordinating services and the most efficient and effective means of delivering such services. The Woodrow Wilson Rehabilitation Center and the City of Richmond have been tentatively selected as regional work sites for the case managers to facilitate service delivery across the State. Case management services in Northern Virginia will be provided by the Fairfax County Office of Human

Services' Community-Based Long-Term Services for Head Injured Persons Program. Presently, the Department is working with the Virginia Commonwealth University Center of Public Service to conduct a needs assessment of handicapped individuals throughout Virginia. It is proposed that the survey will include 30,000 handicapped individuals and will concentrate on determining the ages of survey respondents, identifying the types of disabilities represented, and identifying the level of and gaps in services, by region, available to handicapped citizens.

The Division of Emergency Medical Services of the State Health Department was requested, pursuant to HJR 393 (1989), Training Program on Traumatic Brain Injury for Emergency Medical Services Personnel, to ensure that EMS personnel are trained to provide appropriate emergency medical care to persons who sustain a head or spinal cord injury and trauma and in advanced life-support techniques and treatment. The Division reported that because training in trauma care is already provided, particularly care of head and spinal cord injured persons, it does not recommend that additional training be required at this time. However, the Division is investigating the use of a satellite to facilitate continuing in-service education for EMS personnel.

The Department of Education reported that its study, Education on Central Nervous System Disorders in Health Education Curriculum, which was directed by HJR 394 (1989), indicated that a component on central nervous system disorders and injuries is included in the State's health education curriculum, particularly in the driver education program. The Department has revised its drivers' education manual to include more specific information on central nervous system injuries and has distributed the manual to all driver education teachers. The Department of Education has contracted for speakers, e.g., Tony Lineberry and the Department of Motor Vehicles, for public schools and for in-service training for teachers on central nervous system injuries.

The Medical Society of Virginia was requested to respond to concerns echoed by many family members of handicapped individuals that communication between physicians, patients, and their families greatly needs to be improved. Many persons testified that it is quite difficult, if not impossible, to obtain information on the nature of the patient's injury and the patient's condition. A representative of the Medical Society indicated that there is a need for physicians to be better prepared to provide information concerning head and spinal cord injury, trauma, and other life-threatening illnesses to patients and their families, particularly upon discharge, and at a level that is meaningful for such persons.

However, because the period immediately following or soon after a traumatic injury is critical and the prognosis for such patients may be uncertain, it is very difficult for physicians to provide as much information as patients and families would like at that time. The Medical Society does not have an organized program for disseminating information of this type, but it is contemplating a more formalized method for its members. The Joint Subcommittee acknowledged the need to encourage licensed practicing physicians to provide more information to patients and their families in order that they might be informed of the nature of injuries to the central nervous system and potential cognitive, emotional, and social deficits that may result. Because immediate and appropriate medical care is critical to the patient's survival and the minimization of long-term chronic

disabilities, the Joint Subcommittee noted the need to request State teaching hospitals to standardize the education of emergency room personnel and to improve the emergency room head trauma flow sheets to facilitate the flow of information between EMS and emergency room personnel, physicians, and specialists to ensure the accurate diagnosis and appropriate treatment for each patient.

To assist physicians in becoming better informed about central nervous system disabilities, the care and treatment of such injuries, and the needs of patients and their families, the Medical Colleges of Virginia Division of Brain Injury Rehabilitation Services is expanding its communications capabilities to provide physicians with greater access to data and resources essential in treating persons with traumatic brain injury and other traumatic injuries. Such services and resources include referral and networking, an extensive audiovisual library, clearinghouse activities, conferences and workshops, a certificate program for case managers, access to in-house medical services, and consultations with peers, specialists, and technicians in other disciplines.

IV. RECOMMENDATIONS TO THE COMMISSION ON THE COORDINATION OF THE DELIVERY OF SERVICES TO FACILITATE THE SELF-SUFFICIENCY AND SUPPORT FOR PERSONS WITH PHYSICAL AND SENSORY DISABILITIES

The Joint Subcommittee deliberated at length concerning its findings and determined that several of its findings and proposed recommendations required further extensive exploration prior to developing or recommending a course of action or changes in public policy. At the request of the Joint Subcommittee, its staff presented a comprehensive review of federal and state law concerning the rights of the handicapped, vis-a-vis mandated services, and services available to such persons. It was determined that several state agencies have responsibility for rendering care, treatment, or services to the handicapped in Virginia and that many services are delivered at the local level by private providers and other entities within the community. It was determined further that there had not been an analysis or compilation of such services to assess need, availability, costs, quality, and adequacy of service delivery or to determine whether there is fragmentation and duplication of such services. Given the data and upon recommendation of the staff, the Joint Subcommittee recommends that a commission be established to address these issues.

The Joint Subcommittee hereby refers the following proposed recommendations to the Commission on the Coordination of the Delivery of Services to Facilitate the Self-Sufficiency and Support for Persons with Physical and Sensory Disabilities for further study:

- 1. The Board of Education be requested to develop a cost-effective and comprehensive plan to address the needs of physically handicapped students for enhanced technological communication capabilities, access to barrier-free school buildings, appropriately equipped school buses and transportation aides where necessary, heightened sensitivity to and acceptance of their handicaps by school personnel and nonhandicapped students, and greater opportunities for full integration in regular instructional programs.***

2. ***The Code of Virginia be amended to require that special education and related services, appropriate to the needs of traumatically brain injured children who are within the age range for whom special education is required by federal and state laws, be provided for such children.***
3. ***The Board of Education conduct a study to identify students in special education with traumatic brain injury and determine whether such students have been misdiagnosed and inappropriately placed in special education classes.***
4. ***The Code of Virginia be amended to authorize the Board of Education to require that the health history form of all students entering the public schools indicate whether the child has sustained any injury by accident or birth, including head injury, spinal cord injury, or other injury or disease of the central nervous system in order that the child's need for special education or other appropriate services might be evaluated.***
5. ***The Department of Education be requested to develop a mechanism to facilitate the re-entry of children with traumatic brain injury into the educational system.***
6. ***The Department of Education be requested to determine whether a long-term tracking system is necessary to address the needs of children under five years of age with head injury and other physical disabilities.***
7. ***The Department of Education be requested to provide in-service training on traumatic brain injury and the educational needs of traumatically brain injured students for classroom teachers and pupil personnel staffs.***
8. ***The Board of Education, the State Council of Higher Education, and the Board for the Virginia Community College System be requested to collaborate in the development of linkages to provide transitional education programs for children and students with traumatic brain injury.***
9. ***The General Assembly be requested to appropriate funds to establish model behavioral treatment and housing programs.***
10. ***The Virginia Association of Juvenile and Domestic Relations District Court Judges be requested to provide information on the etiology and epidemiology of traumatic brain injury, the cognitive, physical, social, and behavioral manifestations of traumatic brain injury, and the relationship between traumatic brain injury and violent crimes to its members and their court services unit personnel in order to identify youth with such injuries, assess the association between the injuries and the propensity for violent behavior, and fashion appropriate rehabilitative and punitive alternatives.***
11. ***The General Assembly appropriate funds to facilitate the training of juvenile justice personnel concerning the relationship between traumatic brain injury and violent behavior, support research efforts of agencies which serve aggressive and violent youth, and the publication and dissemination of research and information on available treatment alternatives.***

12. ***The General Assembly amend § 51.5-41 F of the Code of Virginia in order to include employers covered by the Rehabilitation Act of 1973 under the Virginia Rights of Persons with Disabilities Law, thereby providing employees of such persons the right to court appeal.***
13. ***The Code of Virginia be amended to include rehabilitation facilities in the definition of a hospital.***
14. ***The Code of Virginia be amended to include coverage for central nervous system disorders and injuries, rehabilitation, case management, and neuropsychological services among the State's mandated benefits requirements.***
15. ***Health care insurers be requested to include broader coverage for outpatient care in policies issued in Virginia.***
16. ***The Code of Virginia be amended to require disability insurance policies issued in Virginia to cover rehabilitation services.***
17. ***The Code of Virginia be amended to prohibit insurers from including exclusions for rehabilitation services in policies issued in Virginia.***
18. ***The Code of Virginia be amended to prohibit insurers from establishing minimum policy benefits in policies issued in Virginia.***
19. ***The Code of Virginia be amended to require insurers to limit the inclusion of pre-existing condition and waiting period clauses in individual policies issued in Virginia.***
20. ***The General Assembly provide tax credits for landlords who rent housing facilities to the handicapped.***
21. ***The General Assembly be requested to increase the tax on tobacco products, alcoholic beverages, and the amusement tax to create a funding mechanism to supplement the cost of care, treatment, and rehabilitation of persons with central nervous system disorders and injuries and to facilitate regenerative research.***
22. ***The General Assembly be requested to increase the license tax of insurance companies to provide a funding mechanism for the costs of care, treatment, rehabilitation, and regenerative research for central nervous system injuries and disorders.***
23. ***The General Assembly be requested to create and permit taxpayers to donate a portion of their state income tax refunds to the "Central Nervous System Disorders and Injuries Fund."***
24. ***The Commission on the Coordination of the Delivery of Services to Facilitate the Self-sufficiency and Support for Persons with Physical and Sensory Disabilities recommend other revenue generating initiatives to provide funding for prevention and research of central nervous system injuries and disorders, and the care, treatment, and rehabilitation of persons with such injuries and disorders who cannot afford such services.***

V. RECOMMENDATIONS OF THE JOINT SUBCOMMITTEE

During the past two years, the Joint Subcommittee Studying the Needs of Head and Spinal Cord Injured Citizens, the Need for Research and the Needs of All Handicapped Persons (HJR 287) worked arduously to identify the needs of persons with traumatic brain injury, spinal cord injury, and others who suffer from physical disability and sensory impairments. While the Joint Subcommittee recommended a number of initiatives during the first year of its study to address the needs of persons with central nervous system diseases and disorders, additional research, testimony from handicapped individuals and their families, and the expertise of health care providers and professionals representing many disciplines have enabled the Joint Subcommittee to gain an expanded understanding of the needs of handicapped persons and to identify many of the factors which impact the delivery of programs and services for such individuals. The Joint Subcommittee offers the following recommendations to address the critical needs and to improve the delivery of appropriate services and care to such persons.

1. The Joint Subcommittee recommends the establishment of a commission to study ways to coordinate the delivery of services to facilitate self-sufficiency and support among persons with physical and sensory disabilities.

Discussion: In Virginia, approximately 351,000 citizens are affected by physically disabling conditions. Today, the lives of many severely injured persons who would otherwise die are extended by advanced medical technologies. With the increasing sophistication of such technologies, many more persons will likely survive serious accidents and will require extensive rehabilitation and long-term care. However, because the needs of such persons frequently exceed the program services and resources configuration of public agencies, program eligibility criteria, exclusions, waiting periods, and gaps in benefits and services in public and private third-party health insurance coverage leave many such persons without resources to pay for medical and rehabilitative services. Further, to ensure that handicapped and disabled children and youth receive an education appropriate to their unique needs, it is necessary that the role and responsibilities of public education in providing special education, as required under P. L. 94-142, as amended, and Article 2 (§ 22.1-213 et seq.) of Chapter 13 of Title 22.1 of the Code of Virginia, be better integrated with human service and economic development agencies to enhance special education programs and facilitate transitional programs. Because categorical funding sources and current performance standards often circumscribe interagency coordination in meeting the needs of handicapped persons for individualized services, goals and processes for service delivery are required to ensure such persons access to appropriate levels of care and opportunities for optimum self-sufficiency and employment.

Although there is currently no way to determine the number of handicapped Virginians who will require rehabilitative and other services, the Joint Subcommittee notes that the Commonwealth's ability to respond to the needs of handicapped persons in the future will depend largely upon strategic planning for more effective and efficient delivery of medical and related services; the development of sound health, social, and fiscal policies respecting care and treatment of handicapped citizens; public awareness and community support; the

eradication of discriminatory and architectural barriers; and, most importantly, a method to project as accurately as possible the number of handicapped children and adults who will require special education, rehabilitation, family support, long-term care, financial assistance, housing, and assistive technologies so that accommodations can be made to meet those needs.

It is the position of the Joint Subcommittee that these issues require immediate attention. It believes that a comprehensive response to the needs of the handicapped would be the most effective and efficient manner in which to proceed and that the delivery of services would be better expedited if a mechanism were in place to ensure prompt, appropriate, and coordinated service delivery in the least restrictive environment. It is appropriate that the goals, responsibilities, and desired outcomes of the public and private sector regarding persons with disabilities receive legislative review to facilitate the availability, accessibility, and coordination of essential services and to ensure the participation of the consumers of such services in the review process. The Joint Subcommittee recommends that a legislative commission be established to identify barriers to needed services, fragmentation and duplication of services, and perceived inadequacies in public programs for handicapped citizens. It recommends further that the Commission: (i) review the findings and recommendations referred to it for action by the Joint Subcommittee; (ii) review and determine the measures and incentives that provide accountability and support coordinated services for persons with physical and sensory disabilities; (iii) develop strategies for optimum use of public and private fiscal resources and insurance; (iv) determine methods to address the gaps in eligibility criteria for services and the service delivery system that inhibit access to needed services and employment opportunities; (v) develop human resource models to facilitate rehabilitation-oriented case management and other professional support for persons with physical and sensory disabilities; (vi) evaluate the need and recommend strategies for research and a system to provide post-acute and long-term rehabilitation for traumatic injury and specified disability groups; (vii) identify and develop service delivery models to address the multifaceted and long-term needs for treatment, community support, transportation, housing, employment, job training and placement, and vocational and career counseling services; and (viii) determine ways to promote coordination and cost-sharing of programs and services between public and private rehabilitative and education entities.

To assist the Commission in carrying out its charge, the Joint Subcommittee agreed that a specific definition of physical and sensory disability should be established to better identify the prevalence of disabilities in the Commonwealth. For the purposes of the study, the Joint Subcommittee determined that ***"physical and sensory disability" shall include temporary and permanent motoric impairment sustained by disease of or injury to the central nervous system, traumatic brain injury, and disabilities resulting from disease of or injury to the sensory system.***

2. The Joint Subcommittee supports the need to explore the feasibility of assisting localities in establishing paratransit systems for handicapped persons within their jurisdictions.

Discussion: Self-sufficiency and independence hinge on an individual's ability to move freely in society. This fact is demonstrated most vividly among persons who are physically disabled and for whom transportation is a critical need. Unfortunately, escalating operating costs, the need for expensive, specially-equipped vehicles, and the inability of many physically disabled persons to afford higher fees for transportation have resulted in the reduction or elimination of the paratransit systems for the physically handicapped in many localities. The lack of adequate transportation services is exacerbated by public transit systems which cannot accommodate persons in wheelchairs and paratransit systems which are unavailable during regular hours. The need for transportation for the handicapped is an ever present dilemma which must be resolved. Local governments must be encouraged to and assisted in providing such transportation services at a price which is affordable, yet sufficient to cover the costs of such services. This goal might be achieved through sharing equipment and resources, the development of regionalized services by localities, and streamlining operations and regulations to increase flexibility and efficiency in the services. The Joint Subcommittee believes that the improvement of transportation services would enhance the quality of life for handicapped persons, assist them in attaining independence, promote healthy attitudes, and facilitate communication and their involvement within the community. Therefore, it supports the Department of Rehabilitative Services' request for funding of a pilot program to provide transportation services to the handicapped.

3. The Joint Subcommittee supports the budget initiatives of the Department of Rehabilitative Services to provide personal assistance services for the handicapped.

Discussion: It is estimated that 214,000 persons with a wide range of handicapping conditions require personal assistance services to live productive and independent lives. However, the vast majority of such persons do not receive personal assistance services due to inadequate funding, lack of appropriately trained providers, restricted services, disincentives to employment, and prohibitive eligibility criteria based upon income, program participation, and medical condition. To address this need, the Department of Rehabilitative Services has requested funding for the development of a personal assistance services system to provide in-home assistance for severely handicapped citizens who are either employed, enrolled in an educational program, or engaged in training activities. The Joint Subcommittee supports this effort as a means of encouraging and assisting many handicapped persons toward self-sufficiency.

4. The Joint Subcommittee supports the continuation and expansion of the Virginia Housing Development Authority's model housing programs to increase housing opportunities for the handicapped.

Discussion: Available and affordable housing is one of the greatest needs of handicapped persons. Housing and other living arrangements, appropriate to the needs of such individuals, are crucial to their reintegration within the community and, ultimately, their rehabilitation. However, all too often, available housing may require extensive modifications, the cost of housing is prohibitive, and communities resist the location of housing for the handicapped in their jurisdictions.

The Joint Subcommittee is aware of the success of programs administered by the Virginia Housing Development Authority to address the housing needs of the handicapped, and it supports the continuation and expansion of such programs to increase housing opportunities for the handicapped.

5. The Joint Subcommittee supports the work of and encourages the Secretaries of Transportation, Public Safety, and Health and Human Resources, and the Attorney General to continue their collaborative effort to enhance public awareness of the importance of complying with state safety laws pursuant to HJR 396 (1989).

Discussion: Each year, thousands of Virginians sustain life-threatening and permanent injuries to the central nervous system. While highly sophisticated medical technology has contributed significantly to the survival and restoration of many injured persons, such injuries can devastate and dramatically alter lives. Over the course of its study, the Joint Subcommittee came to realize that the range of physical, cognitive, and sensory disabilities is unending. There are no cures for these debilitating conditions. Noting that the vast majority of annual injuries are associated with motor vehicle collisions, boating and sports accidents, falls in the home, physical abuse, and risk-taking behaviors, the Joint Subcommittee concluded that one significant way to reduce the rate of mortality and morbidity attributable to such injuries is through education and prevention. In 1989, upon the recommendation of the Joint Subcommittee, the General Assembly requested the Secretary of Health and Human Resources, the Secretary of Transportation and Public Safety, and the Office of the Attorney General to work collaboratively to promote public awareness and education concerning the need to comply with existing health and safety laws. Representatives of the Secretaries and the Attorney General reported to the Joint Subcommittee this year that numerous efforts are already in progress to heighten the public's awareness of DUI, seat belt, infant restraint, and helmet laws, and they have prepared a comprehensive public education promotion for distribution and broadcast throughout the Commonwealth. The promotion emphasizes the role of emergency medical services personnel, the contributions of the medical profession, the tragic results of the violation of state laws, improper judgment and risk-taking behavior, the Commonwealth's authority to protect public health and safety and to enforce the law, and the responsibility of citizens to comply with laws and refrain from risk-taking behavior. The Joint Subcommittee supports and encourages the continued, collaborative efforts of the Secretaries of Health and Human Resources, Transportation, and Public Safety, and the Attorney General to enhance public awareness as a means of reducing such tragic injuries.

6. The Joint Subcommittee recommends that the Department of Mental Health, Mental Retardation and Substance Abuse Services affirmatively determine means to improve the process of collecting and maintaining data on the status and needs of head injured clients served through its facilities and the community services boards (CSB's).

Discussion: Standard screening tests to detect head injury lack the necessary sophistication to determine such injuries in all instances. As a result, some individuals have been misdiagnosed and inappropriately placed in mental institutions and other health care facilities which are not prepared to meet their needs. Upon discharge from these facilities, many persons are referred to local community services boards (CSBs) to provide continued care at the community level. However, such individuals, having been previously misdiagnosed, may continue to receive inappropriate treatment through this medium, exacerbating their condition. To prevent future problems concerning the misdiagnosis of traumatically brain injured persons, the Joint Subcommittee recommends that the Department conduct an epidemiological study of the number of head injured patients who are residing in State mental institutions and who are served by local CSB's.

7. The Joint Subcommittee recommends that the Department of Rehabilitative Services, with the assistance of the Department of Mental Health, Mental Retardation and Substance Abuse Services, develop an interagency plan of coordinated services for persons with neurological and/or head injury problems.

Discussion: Injury and disease of the central nervous system can result in neurological problems and cognitive impairment as well as physical disability. Many persons who have physical, cognitive, and sensory disabilities have multiple handicapping conditions. Nevertheless, many of them can benefit to various degrees from appropriate and coordinated rehabilitation therapy. Such disabilities deem it necessary to utilize a multifaceted approach to treatment and care to assist such persons toward regaining self-sufficiency and independence. Handicapped individuals have a greater chance of realizing their maximum potential in these areas when they are able to access available services with a minimum of difficulty. Because the programs and services such persons require are delivered by several agencies, interagency cooperation and collaboration is necessary to prevent duplication and fragmentation and to provide effective and efficient delivery of services.

It is the consensus of the Joint Subcommittee that the benefits to be gained by persons with neurological problems and traumatic brain injury can be maximized by collaboration and pooling of the expertise of relevant state agencies. Therefore, the Joint Subcommittee recommends that, in addition to the initiatives of the Department of Rehabilitative Services to increase access to such services and enhance the capabilities of case management, the feasibility of allowing the patient to choose an available public or private provider in his community be explored and that consideration be given to providing a resource and referral program to assist handicapped people in accessing services and to inform them of their rights. The Joint Subcommittee recommends that the Departments of Rehabilitative Services, of Education, of Social Services, and of Mental Health, Mental Retardation and Substance Abuse Services establish regular intervals for consultation with the Interagency Council on the Delivery of Related Services to Handicapped Children regarding the needs of traumatic brain injured children. The Joint Subcommittee recommends further that the Department of Rehabilitative Services, with the assistance of the Department of Mental Health, Mental Retardation and Substance Abuse Services, develop an interagency plan for the delivery of coordinated

services for persons who have mental and/or neurological impairments together with traumatic brain injury. The Department of Rehabilitative Services shall report the status of such plan to the House Committee on Health, Welfare and Institutions and the Senate Committees on Education and Health and on Rehabilitation and Social Services by December 1, 1990.

8. The Joint Subcommittee supports the Department of Medical Assistance Services' request for the restoration of funds to the State Plan for Medical Assistance Services to provide full coverage of durable medical equipment.

Discussion: Injury to the central nervous system can result in lingering, debilitating physical disabilities which may require intensive, long-term, and expensive rehabilitation. These services most often require the use of durable medical equipment which is not accessible to many handicapped persons without the assistance of Medicaid. Medically necessary supplies, equipment, and appliances, or durable medical equipment prescribed by a physician, can be the greatest recurring expense that a handicapped person will incur. The Joint Subcommittee believes that the restoration of funds to the State Plan for Medical Assistance Services to provide full coverage for durable medical equipment will enable a greater number of handicapped persons to be served and assisted in obtaining some measure of independence.

9. The Joint Subcommittee supports the Department of Medical Assistance Services' proposal to reimburse nursing homes and other participating facilities based on the intensity of care required by the patient.

Discussion: Our population is living longer and advanced technology has enabled the medical profession to sustain and prolong the life of severely disabled and terminally ill persons. As a result of this technology, an increase in consumer demand for nursing home services, and the change in patient acuity in such facilities, nursing homes and other facilities which participate in the Medicaid program must provide health care to persons with chronic diseases and disabilities that are extremely expensive to treat. Due to federally mandated initiatives to contain the escalating costs of health care, certain limits on the reimbursement rates for covered services have been established by Medicaid. However, the reimbursement rates do not in all instances sufficiently compensate for services which nursing homes must provide. Because a substantial portion of patient care is reimbursed by Medicaid, the effects of such mandates are manifested in the lack of skilled nursing home beds available for long-term and chronically ill patients and the increase in costs for nursing home services, particularly for private-pay patients. The Joint Subcommittee supports the Department's proposal to reimburse nursing homes and hospitals based on the intensity of care required by the patient within the limits established under Medicaid regulations. The Joint Subcommittee also supports legislation which would authorize the Department to negotiate special rates with participating facilities with specialized units and services for patients with special needs.

10. The Joint Subcommittee recommends that the Medical College of Virginia, the Medical Center at the University of Virginia, and nonpublic health care institutions review and revise as appropriate their emergency room head trauma flow sheets to improve and increase the type of information given to patients and their families.

11. The Joint Subcommittee recommends that the Virginia Hospital Association encourage its members to provide in-service training of emergency room personnel in appropriate treatment protocol, immediate and long-term symptom patterns, and guidelines for referral to trauma units and for psychiatric or neuropsychological evaluation of pediatric head injury victims.

Discussion: Immediate and appropriate medical treatment of central nervous system injuries is critical to minimizing tissue damage and reducing the tremendous risk of devastating, lifelong disabilities. To facilitate such care, emergency room personnel utilize "head trauma flow sheets" to provide the medical team access to vital information and to refer the person for specialized medical care. The Joint Subcommittee believes that it is essential that head trauma flow sheets contain as complete and accurate information as possible since it aids in the coordination of emergency medical services, hospital emergency centers, and allows attending physicians and specialists to maximize the delivery of critical health care services. The Joint Subcommittee believes that it is equally important that emergency room personnel receive in-service training in appropriate treatment protocol, immediate and long-term symptom patterns, and guidelines for referral to trauma units and psychiatric and neuropsychological evaluation of pediatric head injury patients to ensure consistency in quality and efficiency in emergency care. The Joint Subcommittee recommends that the Medical College of Virginia and the Medical Center of the University of Virginia and other nonpublic health care institutions be requested to review and revise their head trauma flow sheets to ensure the availability of vital information to assist the medical team in the accurate assessment of the patient's treatment needs and in improving the flow of information to families.

12. The Joint Subcommittee recommends that the Medical Society of Virginia encourage licensed practicing physicians to provide more complete information on central nervous system disorders and injuries to patients and their families as soon as practicable after an injury.

Discussion: Injury to the central nervous system is one of the most devastating injuries a human being can sustain. Because each case must be evaluated individually and the period immediately following or soon after a traumatic injury is critical to the long-term outcome for the patient, the prognosis for the individual may be uncertain. Therefore, it may be difficult for physicians to provide as much information as patients and families would like during this critical period. The Joint Subcommittee concluded, however, that there is a need for physicians to be better prepared to provide information concerning central nervous system injuries, disorders, trauma, and other life-threatening illnesses to patients and their families and at a level that is meaningful for such persons. Because such injuries effect not only the patient but his family, often drastically altering family relationships, communication, responsibilities, and burdening family resources, it is important to such persons to know the immediate and potentially long-term effects of such injury as quickly as possible. The Joint Subcommittee believes that increasing the awareness of patients and their families of the immediate and long-term effects of injury to the central nervous system can serve as a means of preventive care. With such information, families could be helped to realize the potential for drastic emotional, cognitive and social changes in their lives as well as in the life of an injured family member and proceed to make changes in their life styles accordingly.

The Society is requested to encourage licensed practicing physicians to provide more complete information on central nervous system disorders and injuries as soon as practicable to patients and their families in order that they might be apprised of the immediate and potential long-term effects of such injuries and disorders, and the possible cognitive, emotional, and social deficits that may result.

13. The Joint Subcommittee recommends that funds be appropriated for the continued development and implementation of a model regionalized telecommunications system which the Medical College of Virginia and the University of Virginia Medical Center were requested to design pursuant to HJR 392 (1989).

Discussion: Thousands of Virginians suffer head and spinal cord injuries, other types of injury to the central nervous system, and trauma each year. The immediate delivery of emergency and tertiary medical care is critical to the survival and recovery of such persons with a minimum of long-term chronic disability. However, in many rural areas of Virginia such specialized medical care and neurosurgeons are not available. Nevertheless, it is essential that health care providers in outlying areas be able to communicate and consult with medical specialists at hospitals with tertiary level of care. It was reasoned that medical information could be transmitted to health care providers in such areas by the establishment of a regionalized telecommunications system which could also be used potentially for other worthy purposes. In 1989, the Joint Subcommittee recommended legislation, which was passed, to request that the Medical College of Virginia and the University of Virginia Medical Center work collaboratively to establish a model regionalized telecommunications system to facilitate medical consultations on central nervous system disabilities between physicians in rural and metropolitan urban areas. These institutions submitted a proposal for the development and implementation of the system to the Joint Subcommittee during the second year of its study. After a thorough review of the design, the objectives of the system and institutions, the immediate and long-term benefits and costs of the system, and the research data to be obtained, the Joint Subcommittee recommends that funds be appropriated for the development and full implementation of the model regionalized telecommunications system. It is the consensus of the Joint Subcommittee that the implementation of this system could be the most cost-effective, innovative program and service that the State could initiate to meet both the needs of persons with central nervous system injuries and to address the very critical need for accessible and available primary and specialized health care in underserved areas of the Commonwealth.

14. The Joint Subcommittee recommends that the Bureau of Insurance and the Virginia Chapter of the Health Insurance Association of America encourage insurers to redefine and reclassify head injury in order that it might be removed from the category of mental retardation and mental illness.

Discussion: The chronicity of traumatic brain injury results in the need for multifaceted educational, health, social, and rehabilitative services. However, testimony and findings of the Joint Subcommittee indicate that many insurance carriers classify head injury in the category of mental illness or mental retardation, categories not typically covered by insurance policies.

Most insurance carriers in Virginia do not provide coverage for educational, social, or rehabilitation services for traumatic brain injury, and many policies include provisions concerning pre-existing conditions and waiting clauses which effectively limit the access to medical and rehabilitative services. Because of the lack of available insurance coverage, many victims and their families must bear exorbitant medical and rehabilitative expenses to enable the victim to regain, to the extent possible, his independence and acquire skills to facilitate his re-entry into the community. The costs of such services are prohibitive. It is believed that the modification of the definition of traumatic head injury to provide more description and specificity and the reclassification of head injury may serve to encourage insurance carriers to list this injury in a reimbursable category of covered health care services. The Joint Subcommittee recommends that the Bureau of Insurance and the Virginia Chapter of the Health Insurance Association of America encourage insurers to redefine and reclassify traumatic head injury.

VI. CONCLUSION

The Joint Subcommittee reaffirms its findings that it is in the best interests of the Commonwealth to provide access to educational, health, respite, transportation, housing, vocational rehabilitation, social, and support services for the handicapped to facilitate the re-entry of such persons into the community, promote family unity, minimize wasted human lives, and reduce the burden of the escalating costs of health care and duplication of services. The implementation of the Long-Term Rehabilitative Case Management System which was recommended by the Joint Subcommittee and was enacted by the 1989 General Assembly will accomplish much to provide a mechanism for the integration and coordination of services to meet the needs of all persons who are functionally disabled, without regard to how their disability was sustained. However, the Long-Term Rehabilitative Case Management System is but the beginning of considerable work and effort that remains to be done to ensure that all persons with disabilities, whether physical or sensory, will have access to opportunities and support services critical to their obtaining independence, productivity, and self-sufficiency.

It is the consensus of the Joint Subcommittee that the Commission which it recommended be created to study ways to coordinate the delivery of services to facilitate self-sufficiency and support among persons with physical and sensory disabilities would be an effective means to conduct a thorough inventory of programs and services available to handicapped persons and their families in Virginia; to identify needs and ways to eliminate barriers to access, duplication and fragmentation of services; and to develop efficient and cost-effective means of service delivery that meet the multiple needs of the handicapped.

The Joint Subcommittee extends its appreciation to all Secretariats, state agencies, the Virginia Head Injury Foundation, and interested citizens for their contributions to its study. Special appreciation is extended to the Department of Rehabilitative Services, the Woodrow Wilson Rehabilitation Center, the Medical College of Virginia, the University of Virginia Medical Center, the Departments of Education, of Medical Assistance Services, of Mental Health, Mental Retardation and Substance Abuse Services, and the Bureau of Insurance for their assistance.

Respectfully submitted,

Alan E. Mayer, Chairman

Arthur R. Giesen, Jr., Vice Chairman

E. Hatcher Crenshaw, Jr.

Virgil H. Goode, Jr.

George H. Heilig, Jr.

Kevin G. Miller

Richard L. Saslaw

Susan F. Urofsky, Commissioner of Rehabilitative Services

BIBLIOGRAPHY

"An Educator's Manual: What Educators Need to Know About Students with Traumatic Brain Injury," National Head Injury Foundation, Inc., 1985.

Coutant, Nancy S. "Rage: Implied Neurological Correlates," Journal of Neurosurgical Nursing, February, vol. 14, no. 1, 1982.

Department of Rights of the Disabled. "Analysis of the Americans With Disabilities Act of 1989," 1990.

"Financing Health Care for People With Disabilities," Rehab Brief, vol. 12, no. 3, 1989.

"Out of Control: The Behavioral Effects of Head Injury," Headlines, Spring, 1990.

Virginia. Report of the State Corporation Commission's Bureau of Insurance on the Financial and Social Impact of Mandated Benefits and Mandated Providers. Virginia, 1989.

Whyte, John and Mel B. Glenn. "The Care and Rehabilitation of the Patient in a Persistent Vegetative State," Head Trauma Rehabil. 1(1):39-53, 1986.

APPENDIX A

HOUSE JOINT RESOLUTION NO. 135

Establishing a joint subcommittee to study the needs of head and spinal injured citizens and needs for research.

Agreed to by the House of Delegates, February 16, 1988
Agreed to by the Senate, March 2, 1988

WHEREAS, an estimated 439 of every 100,000 Virginia citizens have been head injured and about a quarter of them remain disabled by the injury; and

WHEREAS, the number of Virginia citizens who survive traumatic brain injury but remain chronically disabled and in need of care is growing; and

WHEREAS, the direct and indirect costs of care, treatment and rehabilitation of head injured persons are nationally estimated to be over \$10.5 billion each year, with much of the indirect costs resulting from a lack of needed services; and

WHEREAS, many head injured citizens already reside inappropriately in mental health institutions or have become incarcerated due to their head injury deficits; and

WHEREAS, the majority of these head injured citizens are young adults who will be in need of residential and associated case management, social, recreational and day support services for the remaining thirty or more years of their lives; and

WHEREAS, concerns have been raised about the availability in the Commonwealth of community-based residential programs and long-term care facilities for head injured Virginia citizens; and

WHEREAS, there is no long-term action plan to provide for the residential needs, both nursing care and community based, of Virginia's head injured citizens; and

WHEREAS, approximately 6,000 individuals with spinal cord injury are living in Virginia, and there are 215 new injuries each year; and

WHEREAS, eighty percent of spinal cord injuries occur between the ages of sixteen and twenty-five and the impact of such injury can be overwhelming, resulting in paralysis, the need for psychological adjustments, loss of sensation, dysfunctional sex and family life, and other related health problems; and

WHEREAS, spinal cord injuries are among the most expensive to treat as initial medical costs of \$100,000 are frequent, specially equipped vans may cost \$20,000, repair of a "pressure sore" may cost \$20,000, and yearly medical costs without major complications amount to thousands of dollars; and

WHEREAS, the majority of head and spinal injuries are sustained from motor vehicle accidents, falls and sports injuries; and

WHEREAS, rehabilitation for head and spinal injuries does not end with discharge, but must continue throughout the life of the individual; and

WHEREAS, rehabilitation is one of the most costly components of the care and treatment of such persons, and additional support is needed to fund regeneration research, vocational re-training, cognitive and physical rehabilitation, long-term medical care, residential options, and assistance to help such persons develop independent living skills; now, therefore, be it

RESOLVED by the House of Delegates, the Senate concurring, That a joint subcommittee is established to study the needs of head and spinal injured citizens and the need for research to assist such persons in re-entering the community. The joint subcommittee shall be composed of seven members as follows: two members each of the House Committees on Health, Welfare and Institutions and on Appropriations, to be appointed by the Speaker of the House, and one member each of the Senate Committees on Education and Health, on Rehabilitation and Social Services and on Finance to be appointed by the Senate Committee on Privileges and Elections. The Director of the Department of Rehabilitative Services shall serve ex officio.

The joint subcommittee shall study the long-term residential needs of head injured citizens and recommend the most cost effective long-term action plan to provide for the development of residential options in the Commonwealth for Virginia's head injured citizens. It shall also determine the educational, health, emotional, social and rehabilitative needs of head and spinal injured persons, the cost of providing for such needs, the availability of retraining, vocational options and rehabilitative services for such persons, their long-term care needs and availability of such facilities and the projected cost thereof, and the need for research to assist these persons in re-entering the community. The joint subcommittee shall determine the number of head injured Virginians who reside in long-term care facilities, mental health and correctional institutions and out-of-state facilities, and recommend ways in which long-term care, rehabilitative services and research for head and spinal injured persons may best be funded.

All agencies of the Commonwealth shall provide assistance upon request as the joint subcommittee may deem appropriate.

The joint subcommittee shall complete its work in time to submit its recommendations to the 1989 Session of the General Assembly.

The indirect costs of this study are estimated to be \$13,045; the direct costs of this study shall not exceed \$6,300.

**LONG-TERM REHABILITATIVE CASE MANAGEMENT SYSTEM
(HOUSE BILL NO. 1486)**

§ 51.5-9.1. Department designated as state agency for purpose of coordinating rehabilitative services.--The Department is designated as the state agency for coordinating rehabilitative services to persons with functional and central nervous system disabilities. The Department shall provide for the comprehensive assessment of the need for rehabilitative and support services of such persons, identify gaps in services, promote interagency coordination, develop models for case management and advise the Secretary of Health and Human Resources, the Governor and the General Assembly on programmatic and fiscal policies and the delivery of services to such persons.

For the purposes of this section, "functional and central nervous system disabilities" shall include, but not be limited to, traumatic brain injury, spinal cord injury, cerebral palsy, arthritis, muscular dystrophy, multiple sclerosis, and systemic lupus erythematosus (Lupus).

§ 51.5-9.2. Long-Term Rehabilitative Case Management System.--The Department shall develop and pilot a model for the initiation of a Long-Term Rehabilitative Case Management System. Such system shall provide for the coordination of medical, psychosocial, vocational, rehabilitative, long-term care, and family and community support services for persons with functional and central nervous system disabilities.

The Department shall facilitate the provision of such services to the Department and any other state, local, public or private nonprofit agency, organization or facility to such persons.

§ 51.5-9.3. Eligibility for long-term rehabilitative case management.--A person shall be eligible to receive long-term rehabilitative case management services pursuant to § 51.5-9.2 if he is determined by the Department to be disabled indefinitely, requires a combination and sequence of special interdisciplinary or generic care, treatment, or other services which are lifelong or for an extended duration and are individually planned and coordinated, or his disability results in substantive functional limitations in three or more of the following areas of major life activity: (i) self-care; (ii) receptive and expressive language; (iii) learning; (iv) mobility; (v) self-direction; (vi) capacity for independent living; and (vii) economic sufficiency.

§ 51.5-11. Central registry; information contained therein to be confidential.--A. The Department shall establish and maintain a central registry of persons who sustain spinal cord injury other than through disease, whether or not permanent disability results, and brain injury if permanent disability is likely to result, in order to facilitate the provision of appropriate rehabilitation services by the Department and other state agencies to such persons. The Department, in cooperation with organizations representing persons with disabilities maintained by the central registry, shall establish and

pilot a mechanism which utilizes the data maintained by the central registry pursuant to this section to provide client identification, follow-up and outreach; maintain accurate and up-to-date records concerning the client's functional level and need for services; and facilitate better analysis and utilization of such data for effective program, policy and fiscal planning purposes.

B. Every hospital and attending physician shall report to the Department by the most expeditious means within thirty days after identification of any person sustaining brain injury and within seven days after identification of any person sustaining spinal cord injury. The report shall contain the name, age and residence of the person, date and cause of the injury, and such additional information as the Department may deem necessary.

C. Information contained in the registry concerning individuals shall not be subject to the Virginia Freedom of Information Act (§ 2.1-340 et seq.) and shall be confidential for purposes other than those directly connected with the administration of programs under the Department's jurisdiction or as required by other agencies of the Commonwealth. Information needed for research purposes may be made available to an organization or individual engaged in research only for purposes directly connected with the administration of programs relating to persons with disabilities, including research for the development of new knowledge or techniques which would be useful in the administration of the program; however, the organization or individual must furnish satisfactory assurance that the information will be used solely for the purpose for which it is provided, that it will not be released to persons not connected with the study under consideration, and that the final product of the research will not reveal any information that may serve to identify any person about whom information has been obtained through the Department without the written consent of the person, or his legally authorized parent or guardian, and the Department.

§ 51.5-14. Powers and duties of Commissioner.--The Commissioner shall have the following powers and duties:

1. To employ such personnel, qualified by knowledge, skills, and abilities, as may be required to carry out the purposes of this title relating to the Department;
2. To make and enter into all contracts and agreements necessary or incidental to the performance of the Department's duties and the execution of its powers under this title, including, but not limited to, contracts with the United States, other states, agencies and governmental subdivisions of this Commonwealth;
3. To accept grants from the United States government and agencies and instrumentalities thereof and any other source and, to these ends, to comply with such conditions and execute such agreements as may be necessary, convenient or desirable;
4. To do all acts necessary or convenient to carry out the purposes of this title;

5. To develop and analyze information on the needs of persons with disabilities;

6. To develop plans, policies and programs for the delivery of services to persons with disabilities for consideration by the Governor and the General Assembly. Such policies, plans and programs for services to those who cannot benefit from vocational rehabilitation shall be prepared over time, and as funds become available for such efforts;

7. To operate and maintain the Woodrow Wilson Rehabilitation Center and to organize, supervise and provide other necessary services and facilities (i) to prepare persons with disabilities for useful and productive lives, including suitable employment and (ii) to enable persons with disabilities, to the degree possible, to become self-sufficient and have a sense of well-being;

8. To develop criteria for the evaluation of plans and programs relative to the provision of rehabilitative and other services;

9. To investigate the availability of funds from any source for planning, developing and providing services to persons with disabilities, particularly those not capable of being gainfully employed;

10. To coordinate the Department's plans, policies, programs and services, and such programs and services required under § 51.5-9.2, with those of the other state agencies providing services to persons with disabilities so as to achieve maximum utilization of available resources to meet the needs of such persons;

11. To compile and provide information on the availability of federal, state, regional and local funds and services for persons with disabilities;

12. To accept, execute and administer any trust in which the Department may have an interest, under the terms of the instruments creating the trust, subject to the approval of the Governor; and

13. To perform such other duties as may be required by the Governor and the Secretary of Health and Human Resources.

APPENDIX B

HOUSE JOINT RESOLUTION NO. 287

Continuing the Joint Subcommittee Studying the Needs of Head and Spinal Cord Injured Citizens and Needs for Research and requesting that the joint subcommittee review the needs of all physically handicapped persons.

Agreed to by the House of Delegates, February 24, 1989

Agreed to by the Senate, February 23, 1989

WHEREAS, head injury is a major health problem, affecting more than 1.9 million people nationally, and nearly 14,000 Virginians suffer head injuries each year; and

WHEREAS, injury to the brain threatens the most profound and complex body functions, greatly diminishing physical and cognitive functions temporarily or permanently; and

WHEREAS, an estimated 10,000 people sustain new permanent, disabling spinal cord injuries each year, and approximately 6,000 Virginians have spinal cord injuries with varying degrees of permanent injury; and

WHEREAS, spinal cord injury may result in either the partial or complete loss of control of specific muscles and sensation of certain body parts; and

WHEREAS, many of these persons also suffer from both head and spinal cord injury or other equally debilitating disorders, and share common needs with other persons with central nervous system disorders for adequate housing, transportation, on-going health and medical care, rehabilitation, case management, and regenerative research; and

WHEREAS, because many of these persons are uninsured or have exhausted their benefits, they do not receive needed medical care and support services; and

WHEREAS, there is no state mechanism to deliver essential services to them in an effective and cost-efficient manner; and

WHEREAS, the joint subcommittee identified other critical needs of this population which require examination and resolution; and

WHEREAS, the joint subcommittee reviewed various proposals to establish a mechanism to meet the needs of such persons, but it requires additional time to assess the efficacy of the proposals and to determine whether other approaches may be more appropriate; and

WHEREAS, the physically handicapped in general have been the victims of various forms of discrimination, especially with regard to housing and programs of care; and

WHEREAS, the needs of such physically handicapped persons for housing, education, training and job placement require attention; now, therefore, be it

RESOLVED by the House of Delegates, the Senate concurring, That the Joint Subcommittee Studying the Needs of Head and Spinal Cord Injured Citizens and the Needs for Research is continued. The current membership of the joint subcommittee shall continue to serve.

The joint subcommittee shall include in its deliberations an examination of the following: (i) the extent to which persons with head injuries are misdiagnosed and inappropriately placed in mental health institutions; (ii) the relationship between head injury and crime; (iii) the needs of head and spinal cord injured children, particularly those between the ages of fifteen and twenty-one; (iv) the need for a community coordinator at the state's medical schools; (v) the need for regional demonstration projects for long-term care of low-level functioning head injury survivors, and demonstration behavioral treatment programs; (vi) the adequacy of coverage and benefits of health insurance for central nervous system disorders; (vii) the need for establishing revenue-generating initiatives to fund services and research for persons with central nervous system disorders; and (viii) the needs of the physically handicapped in general, the effectiveness of existing programs in meeting those needs, and the need for and cost of additional programs for all physically handicapped persons.

All agencies of the Commonwealth shall provide assistance upon request as the joint subcommittee may deem appropriate.

The joint subcommittee shall complete its work in time to submit its findings and recommendations to the Governor and the 1990 Session of the General Assembly, as provided in the procedures of the Division of Legislative Automated Systems for processing legislative documents.

The indirect costs of this study are estimated to be \$15,440; the direct costs of this study shall not exceed \$8,560.

APPENDIX C

SUMMARY OF LEGISLATION ENACTED BY THE 1989 GENERAL ASSEMBLY

Upon the recommendation of the Joint Subcommittee, the 1989 General Assembly enacted the following legislation to address the needs of persons with central nervous system disorders and injuries, including head and spinal cord injury.

H.B. 1486 - Established the Long-Term Rehabilitative Case Management System for functionally disabled persons, including those with head and spinal cord injuries, within the Department to: facilitate coordinated medical, psychosocial, familial, vocational, and long term care services; avoid Medicaid expenditures by reducing rehospitalization and medical treatment; increase the potential for independent living by disabled individuals; and promote the family's economic independence by allowing caregivers to reenter the workforce or maintain their employment.

The services available to Virginia residents with disabilities appear to be numerous; however, the growth in the disabled population coupled with the young age of a majority of them has created gaps in such services as housing, vocational rehabilitation, education, respite care and health and medical services. Although vocational rehabilitation is available through the Department of Rehabilitative Services, there is no coordinated effort or a case management system at the state level designed to respond to the needs of individuals with functional disabilities. Many disabled individuals are not eligible for vocational rehabilitation; however, all of the disabled could benefit from long-term, coordinated medical and psychosocial rehabilitation. The Long-Term Case Management System facilitates the coordination of medical, psychosocial, familial, vocational, and health care services to promote healthy, independent lifestyles. In addition, the System (i) minimizes Medicaid expenditures by reducing rehospitalization and medical treatment; (ii) increases the number of individuals who can provide self-care or access independent living facilities, thereby enabling family caregivers to reenter or maintain their place in the workforce; and (iii) motivates individuals with disabilities to become employed.

1989 BUDGET AMENDMENTS

The 1989 General Assembly "provided \$250,000 GF in the second year to assist in the development of a project in Northern Virginia to provide integrated community-based services for the traumatically brain injured population." It also "included \$250,000 GF and six positions to establish a Long-Term Rehabilitation Case Management System pursuant to HB 1486.

SUMMARY OF LEGISLATION ENACTED BY THE 1990 GENERAL ASSEMBLY

Included in the Joint Subcommittee's legislative package to the Governor and the 1990 General Assembly were six resolutions which have been summarized briefly below.

HJR 45 - Establishes a commission on the coordination of the delivery of services to facilitate self-sufficiency and support among persons with physical and sensory disabilities.

It was noted by members of the Joint Subcommittee that delivery of services to disabled individuals would be better expedited if a mechanism were in place to assure prompt coordination and delivery of services in the least restrictive environment. As set forth in HJR 45, the proposed commission would identify barriers to needed services, as well as fragmentation and perceived inadequacies in public programs for traumatically injured citizens of the Commonwealth.

HJR 165 - Requests the Bureau of Insurance to encourage the Health Insurance Association of America to urge its members to redefine and reclassify head injury.

This resolution is a response to findings which indicate that many insurance carriers classify head injury in categories not typically covered by insurance policies, for example, mental retardation. Modifying the definition of head injury to make it more descriptive and specific may serve, in part, to encourage insurance carriers to reclassify traumatic head injury as a reimbursable category of needed and underserved health coverage.

HJR 166 - Requests the Medical Society of Virginia to encourage licensed practicing physicians to provide more complete information on central nervous system disorders and injuries to patients and families.

Increasing awareness of the potentially devastating effects that central nervous system injuries pose to individuals and to their families may serve as a means of preventive care, thereby helping families to realize the potential for drastic emotional, cognitive and social change in their lives when a family member sustains such injuries.

HJR 167 - Requests the Department of Rehabilitative Services to develop an interagency plan for coordinating services to persons with neurological or head injuries.

Many persons who have sustained traumatic head injuries can benefit, to some degree, through appropriate and coordinated rehabilitation therapy. Such individuals have a greater chance of realizing their maximum potential for self-sufficiency and independence if they are able to access available services with a minimum of difficulty. HJR 167, through the efforts of the Department of Rehabilitative Services, seeks to improve such access to services.

HJR 168 - Encourages local governments to provide transportation services for physically handicapped persons.

Self-sufficiency and independence hinge on an individual's ability to move freely in society and transportation services remain a critical need for the physically handicapped. Improving such services would improve the quality of life for handicapped persons.

HJR 169 - Requests the Medical College of Virginia and the Medical Center of the University of Virginia to revise head trauma flow sheets.

"Head trauma flow sheets" contain information essential to expeditious and appropriate emergency care of persons who have sustained traumatic head injuries. Revision of such flow sheets to assure the availability of vital emergency medical information would help to minimize tissue damage, and, consequently, reduce the tremendous risk of devastating, lifelong disabilities.

1990 BUDGET AMENDMENTS

A. In response to House Joint Resolution No. 392 (1989), the Medical College of Virginia and the University of Virginia Medical Center submitted a proposal for the implementation of a model regionalized telecommunications system which would include (i) the identification of four community hospitals and their related emergency medical services support systems to participate with MCV and UVA as Head Injury Centers; (ii) the creation of a Trauma Communication, Coordination and Evaluation Unit in each Head Injury Center, and a Trauma Training and Education Unit in each academic health center; (iii) an improved and enhanced emergency clinical management system; (iv) the creation of a multidisciplinary multihospital rapid response system; (v) a prospective study and analysis of the early rapid response system; (vi) a retrospective study and analysis of brain and spinal cord injury patients to identify and correct problems related to early management; (vii) identification of needed modifications to existing transport emergency medical transport systems; and (viii) acute drug management research. The model system would enable physicians and specialists to exchange vital information which could save the lives of thousands of Virginians each year who suffer such injuries and disabilities. It also has the potential of serving many other communications needs for other medical conditions throughout the Commonwealth, thereby reducing the need for costly hospitalizations and long-term care.

The Joint Subcommittee recommended establishment and funding of a model regionalized telecommunications system to facilitate medical consultations on central nervous system disabilities and injuries between physicians in rural and urban metropolitan areas. The budget amendment would provide \$627,295 GF and 6.2 FTE for the Medical College of Virginia Hospitals, and \$405,115 GF and 3.7 FTE for the University of Virginia Medical Center for implementation of the system. However, this budget amendment was not passed by the 1990 General Assembly.

B. Consistent with its findings concerning the need for personal assistance services, the Joint Subcommittee recommended that the budget be amended to provide \$168,000 GF and \$100,000 NGF for the first year of the biennium to fund a pilot personal assistance services program for handicapped persons within the Department of Rehabilitative Services. This amendment was passed by the 1990 General Assembly.