The Australian Journal of Physiotherapy
Complete electronic copy of abstracts of the 20th Century.

The first volume of the Australian Journal of Physiotherapy was published in 1954. Forty years later the Editorial Board committed to providing an electronic version of the abstracts of the Journal for the 40th year anniversary.

The 40 year index was released at the 12th International Congress of the World Confederation for Physical Therapy in Washington in June 1995. This was the precursor of the AJP foray into electronic publication of the Australian Journal of Physiotherapy.

The release of the extended version of the 40 year index (up to 1999) provides electronic access to all the volumes of the Australian Journal of Physiotherapy. The Australian Journal of Physiotherapy is listed on Medline and abstracts from 1996 are available electronically at PubMed


Readers are directed that manuscripts prior to 1978 (Volume 24) did not have abstracts and keywords at the time of printing. Therefore, for these earlier manuscripts, the abstracts are summaries written by the Editorial Board members in 1994.

It is hoped that the contents of these pages serve as a research and historical resource of the Australian Journal of Physiotherapy.

Dr Garry T Allison
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This article reviews concepts of personality, personal relationships, psychological defence mechanisms and tension, and applies these concepts to gain an understanding of the patient-therapist relationship. A mental health view of the therapeutic relationship is adopted, and once the therapist addresses why both themselves and the patient acts the way they do, a greater awareness will result and in turn benefit the patient-therapist relationship.

Keywords: Patients; Physical Therapy; Psychology


Prior to the Second World War the treatment and prognosis of spinal patients was poor. The author records progress made in the management of spinal cord injuries since this period, and the role of the physiotherapist in the rehabilitation in these patients. The return of patients to their previous employment or employment related to their skills may become an appropriate indicator of the success of the rehabilitation process.

Keywords: Paraplegia; Physical Therapy; Rehabilitation, Vocational


Since the establishment of spinal units the physiotherapy techniques used in paraplegia have progressed considerably. This article demonstrates the importance of physiotherapy during all stages of the management of paraplegics, and describes the physiotherapy interventions used at the Royal Perth Hospital Paraplegic Unit. The result of efficient treatment is stated as the attainment of complete independence, which must always be the aim for patients who have suffered spinal injuries.

Keywords: Paraplegia; Physical Therapy; Rehabilitation; Self Care (Rehabilitation)


The causes and clinical features of hemiplegia are reviewed. Physiotherapy treatment rationales and techniques used in the acute and rehabilitation phases are described. The importance role other health professionals assume in rehabilitation such as the social worker in assessing the family situation are emphasised, as personal and family complications can greatly influence progress of the patient in rehabilitation.

Keywords: Hemiplegia; Physical Therapy; Rehabilitation

The role of the occupational therapist as a member of the rehabilitation team concerned with the management of hemiplegic patients is outlined. The use of recreational activities, social activities and self-help devices by the occupational therapist is discussed. Pre-vocational rehabilitation possibilities are presented for men and women, and this aspect is viewed by the author as important in the complete rehabilitation of an individual.

Keywords: Hemiplegia; Occupational Therapy; Rehabilitation


Neurosurgery is the art and science of diagnosis and treatment of surgical diseases of the nervous system, and provides a vital role for each member of the rehabilitation team. The evolution of neurosurgery and the present practice of neurosurgery within the diagnoses of head injuries, cerebral tumours and cerebral aneurisms is discussed. The maintenance of adequate respiratory function, care of the skin, joint and muscle mobility, movement re-education and improvement in morale are all contained within the role of physiotherapy in the neurosurgical patient. The author views optimism and patience as two important qualities to possess when working in the field of neurosurgery.

Keywords: Movement Dysfunction; Neurosurgery; Physical Therapy; Respiratory Therapy


The psychological trauma of a severe burn is considered as an important factor influencing the management of patients suffering from burns. The treatment of superficial and deep burns is examined in three phases; the phase of resuscitation, the phase of preparation for skin grafting during which granulation takes place, and the phase following skin grafting. The physiotherapist's role in the first phase is limited to breathing exercises, though in subsequent phases the chief considerations are the maintenance of joint mobility and the gradual restoration of function.

Keywords: Burns; Physical Therapy; Rehabilitation; Respiratory Therapy


The aspects of and influences on personal motivation, and the effect of these factors on the recovery of patients seen by physiotherapists is addressed in this article. The effects of anxiety, hysteria, obsessional neurosis, other psychiatric conditions and money on the motivation to get well is discussed. The physiotherapist's dilemma in treating these individuals, recognising other contributing factors and conveying this to the physician is acknowledged.

Keywords: Ethics; Physical Therapy; Physicians; Psychophysiological Disorders


This paper is concerned with the features of occlusive cerebrovascular disease. The vascular supply of the brain, clinical effects of occlusive cerebrovascular disease according to the site of the occlusion and the medical and pharmacological treatment of these is briefly described. In
conclusion, the ultimate prognosis in these conditions must be guarded, and treatment is often disappointing, although rehabilitation may assist the alleviation of physical disability and mental suffering.

Keywords: Cerebrovascular Circulation; Cerebrovascular Disorders; Rehabilitation


The nursing care of the hemiplegic patient is described in the acute and rehabilitation phases. Emotional aspects of patient care are considered important by the author, as an atmosphere conducive to recovery needs to be created.

Keywords: Hemiplegia; Nursing; Rehabilitation


The aims, treatment techniques and rationale of physiotherapy used in the rehabilitation of the hemiplegic patient are reviewed briefly in this paper. Integration with other members of the rehabilitation team is viewed as essential to the patient's thorough rehabilitation.

Keywords: Hemiplegia; Physical Therapy; Rehabilitation


Indications for speech therapy in hemiplegia, as well as methods utilised in treatment of specific disorders of speech are discussed. The complexity of aphasia is presented, and association methods of treatment in speech therapy are briefly explained.

Keywords: Hemiplegia; Speech Therapy; Rehabilitation


This paper considers the patient with hemiplegia from physical, psychological, social and economic aspects. Therapy is described in terms of the psychological aspects of therapy, and functional and daily activities. Aims of treatment interventions are outlined, and methods are briefly described.

Keywords: Hemiplegia; Occupational Therapy; Rehabilitation


The role of medical social work in rehabilitation of the hemiplegic patient is briefly described. The social worker assesses the social situation of the patient and assists the patient in the constructive acceptance of their handicap. The focus of social work is on the patient as an individual member of society and on the use of resources which are available to assist the patient.

Keywords: Hemiplegia; Rehabilitation; Social Work

Congenital talipes equinovarus is characterised by the deformities of adduction of the forefoot, inversion at the midtarsal and subtalar joints, plantarflexion at the ankle and occasionally an internal rotation deformity of the tibia. The author recommends early gradual over-correction, and the methods of applying these forces are described and illustrated. If conservative management fails, a treatment plan must be devised by the orthopaedic surgeon. The author reinforces the importance of teaching the mother how to manipulate a club foot.

Keywords: Club Foot; Orthopedics; Physical Therapy

Hand injuries are responsible for about 60 per cent of industrial compensation expense, and around one third of injuries presenting at hospital casualty departments involve the hand. Causes and functional considerations in management of hand injuries are outlined. Initial assessment, postoperative care, and early management of the skin and bone components of the injury are presented. Aims and techniques of physiotherapy treatment, and the associated psychological aspects are discussed. Subsequent medical management of nerve and tendon injuries is mentioned.

Keywords: Hand Injuries; Physical Therapy; Rehabilitation


This paper seeks to present a more satisfactory classification than is presently available for injuries around the ankle. An anatomical classification of injuries about the ankle joint is presented and some of the anatomical factors influencing diagnosis and management are discussed. Injuries, single and combined, to ligaments, tendons and bones are described with appropriate methods of treatment and some indication of the likely outcome.

Keywords: Ankle Injuries; Manual Examination; Physical Therapy


The unique characteristics of the knee joint, and their relationship to anatomical factors and injury are outlined. Common injuries of ligaments and menisci and their management are discussed.

Keywords: Anatomy; Knee Injuries; Physical Therapy


Common lesions of the hip and shoulder joints which may require surgical intervention are described. An understanding of the anatomy and pathology of these conditions, together with some appreciation of the surgical procedures employed is required by the physiotherapist responsible for these patients in the convalescent phase.

Keywords: Hip Joint; Physical Therapy; Shoulder Joint; Surgery


The author believes physiotherapists should be acutely aware of the factors which cause the vast range of differences characterising the people they see in professional practice. The forces contributing to the formation of personality and individuality are considered along with the therapeutic implications of dealing with the varying personalities of human beings. The role of self
evaluation and self-control in a personal philosophy of life is believed to be essential, and service to the community is considered valuable in assisting this self-adjustment process. Keywords: Physical Therapy; Professional Practise; Psychology


Psychoprophylactic methods of relieving the painful nature of childbirth are reviewed. These including hypnotism, antenatal care, the psychoprophylactic method, and the methods developed by Grantly Dick-Read and Fernand Lamaze. The development, rationale and implementation of the various methods are discussed. Keywords: Labor; Pain; Physical Therapy; Prenatal Care


An overview of the psychoprophylactic method of painless childbirth as practised in Paris is described. This is followed by a detailed description of the training for pregnant women according to the lecture content. The lectures include an explanation of the basis on which the method functions, the anatomy and physiology of pregnancy and labour, the teaching of new conditioned reflexes so that the contractions do not reach the pain threshold, methods of breathing, foetal movements, uterine contractions, neuromuscular control, and the integration of the techniques during the stages of labour. Information on early results of the program are presented to support the success of the technique, and a growing interest in the method is recorded. Keywords: Labor; Pain; Physical Therapy; Prenatal Care


The method of training patients for enlightened labour and pain-free delivery at Busselton District Hospital is outlined. While the method is based on the psychoprophylactic method as taught in Paris, an effort to combine the simplest and best aspects of various antenatal training programs has been made. The training of patients from the physiotherapists viewpoint is described in detail, and the results are summarised. Results of this method indicate a substantial reduction in the use of analgesia in childbirth. Keywords: Labor; Pain; Physical Therapy; Prenatal Care


Scoliosis is considered by the author as created by the patient in an effort to relieve pain. This belief is supported by the work of many other authors that have shown how the body tilts to relieve the tension of a nerve root which is stretched over a protrusion of intervertebral disc material. A second explanation presented by the author is that the tilt opens the intervertebral disc space between the affected vertebrae to relieve the internal pressure on the disc. The observations recorded in this
paper show that a third mechanical factor must be involved with the creation of the scoliosis which acts on the vertebral column independently of pain.
Keywords: Low Back Pain; Neuralgia; Physical Therapy; Scoliosis


This paper commences with accounts of the first successful operative treatments of the cardiac conditions mitral stenosis, patent ductus arteriosus, Fallots tetralogy and coarctation of the aorta. The development of pump oxygenators to maintain the processes of oxygenation and circulation to the rest of the body during surgery is discussed, as it constituted one of the major technical problems facing cardiac surgery during its development. Experimentation with the use of hypothermia as a means of reducing the oxygen needs of the body and improving the technique of cardiac surgery is expected to provide an opportunity for further advances in the area.
Keywords: Heart Surgery; Hypothermia; Research


The anatomy and functions of the deltoid muscle are outlined. The relationship of glenohumeral and scapulothoracic joints in shoulder movement, the role of the sternoclavicular and acromioclavicular joints and the mechanical requirements for shoulder joint motion are described. The aetiology and clinical features of circumflex nerve injury is illustrated with two case histories.
Keywords: Muscle Hypotonia; Nerve Tissue Injury; Physical Therapy; Shoulder Joint


Pain in the region of the shoulder may be referred or it may arise from a local lesion. Differential diagnosis of shoulder pain is discussed, and it is reported that pain originating from the shoulder joint on movement indicates a local cause. The treatment of cervical lesions, supraspinatus tendinitis, subacromial bursitis and adhesive capsulitis, which together account for around 90 per cent of shoulder pain is outlined.
Keywords: Pain; Physical Therapy; Shoulder


This article describes the formation of a short wave diathermy circuit and the generation of the field. The indications for it's therapeutic application are any conditions that affect the musculoskeletal system, and occasionally in other systems where the analgesic effects of heat are required.
Keywords: Analgesia; Physical Therapy; Short-Wave Therapy

The management of burns is a difficult and complicated problem. Between 1939 and 1954 there was a slow decline in the death rate from burns due to improvements in management of shock, fluid and electrolyte balance and sepsis. Since 1954 there has been little further improvement, and it is thought some unknown factor is responsible for the deaths still occurring. The prevention, early treatment and late treatment of burns including methods, rationale and prognosis is discussed. The maintenance of morale in these patients through the co-operation of all the different departments in the hospital is considered essential.

Keywords: Burns; Mortality; Treatment Outcome

The anatomical systems within the chest are discussed. Disorders of these systems are reviewed in the context of current operative practices. Conditions covered associated with the heart and great vessels include pulmonary valve stenosis, aortic stenosis, septal defects, Fallots tetralogy, intrathoracic aneurisms and heart block. Advances in the field of oesophageal disease involve the use of bypass operations to replace the thoracic oesophagus with the right half of the colon. Pulmonary advances described cover the management of empyema, lung cancer, chest trauma the prevention of atelectasis.

**Keywords**: Anatomy; Thoracic Surgery; Respiratory Therapy


Breathing exercises have been noted as a form of therapy amongst the Chinese as early as 2,5000 BC. The medical aspects of bronchiectasis, chronic bronchitis, asthma and emphysema are briefly described. The principles of physiotherapy treatment are discussed and the important aspects of practice in these conditions emphasised.

**Keywords**: Lung Diseases; Physical Therapy; Respiratory Therapy


The disturbances producing disordered respiration, and the influence physiotherapy may exert on pulmonary function in the presence of these disorders are discussed. Exercise programs and postural drainage positions for use at home in patients with asthma, chronic bronchitis and emphysema are detailed.

**Keywords**: Exercise Therapy; Lung Diseases; Physical Therapy; Respiratory Therapy


Current textbooks cover physiotherapy in emphysema poorly, and concepts contained are based on inadequate definition, imperfect diagnostic criteria and outmoded physiology. This paper presents modern views on the terminology and definition of chronic obstructive lung disease, and emphasises that the disease is irreversible. The abnormal physiology of emphysema is briefly described and the principles of physiotherapy outlined, focusing on the promotion of more efficient breathing through recruitment of the diaphragm and the use of relaxation. A practical approach to the management of patients severely disabled by emphysema is described.

**Keywords**: Emphysema; Physical Therapy; Relaxation; Respiratory Therapy

Electromyographic techniques are extremely useful in the measurement of early lower motor neurone regeneration when there is only minimal denervation, and in the diagnosis of rare syndromes such as myasthenia gravis. The apparatus used in electromyography are recorded, and the normal and abnormal electrical activity of muscles is detailed. The procedure for assessing peripheral nerve lesions using this technique is described along with factors affecting the recovery of normal function in this type of lesion.

Keywords: Electromyography; Muscle Denervation; Nerve Regeneration


This paper discusses the clinical features of a variety of conditions directly or indirectly affecting muscle power and efficiency. Local causes of muscular weakness, generalised disorders producing muscle weakness and lesions affecting the nerve supply are detailed. An understanding of the features of these disorders and the underlying pathophysiology presented is necessary to appreciate the role and objectives of physiotherapy these conditions.

Keywords: Movement Disorders; Neuromuscular Diseases; Physical Therapy


Child development proceeds in a precise and regular manner, and a thorough knowledge of normal development allows an examiner to detect abnormal development. A description of reflexes present in full-term babies, the classification of stages of development and developmental diagnosis is contained in this paper. Causes of developmental retardation and difficulties of diagnosis in the presence of multiple handicaps are outlined.

Keywords: Child Development Disorders; Infant; Physical Therapy


The role of paramedical personnel in the manufacture and fitting of the lower limb prosthesis is the focus of this article. General prosthetic requirements and specific functional requirements such as security from a fall, minimising energy consumption in normal walking and the achievement of a walking pattern as close to normal as possible are addressed. The accommodation of deformities and fitting the prosthesis are reviewed. The author states the two essential aspects of prosthesis requirements are that no noxious stimuli associated with the use of the prosthesis enter the consciousness, and the conscious effect of the prosthesis is minimal when performing normal activities.

Keywords: Gait; Leg; Physical Therapy; Prosthesis


The term proprioceptive neuromuscular facilitation refers to the facilitation of movement through afferent stimulation of the central nervous system. This technique of muscle re-education emphasises the mass movements obtained through central excitation, in contrast with the usual
isolated muscle re-education methods. Skilful use of the technique allows strength of weak muscles to be built up rapidly, assisting correction of muscle imbalance. It is necessary to be aware of the physiology of the neuromuscular system and the kinesiology of normal muscle movements in order to understand the rational behind the technique. This is revised, and the techniques and patterns of proprioceptive neuromuscular facilitation presented. Points to consider while executing the techniques are outlined.

Keywords: Exercise Therapy; Movement Disorders; Neurophysiology; Physical Therapy

Surgical intervention for the rheumatoid hand is directed towards restoring function rather than improving cosmetic appearance. Due to the laying down of rheumatoid granulation tissue in soft tissue structures, mobility and function are compromised. This paper discusses some of the more common presentations of the rheumatoid hand and the surgical procedures involved in the restoration of function.

Keywords: **Carpal Tunnel Syndrome; Hand; Rheumatoid Diseases**


Backache is a common cause of morbidity in our community. The five major causes of back pain are skeletal, pyrexial, visceral, nervous and psychological. Early diagnosis, effective assessment and subsequent treatment are vital to the adequate relief of symptoms. If psychological factors are involved, then both local treatment and overall psychological support are required for successful care. A thorough history and objective examination will ensure accurate classification of the cause of back pain and thus appropriately assist choice of treatment which may include correction of posture and or manipulation.

Keywords: **Backache; Pain; Posture; Spine**


Alteration of the normal range of an intervertebral joint may result in symptoms including pain, both locally and referred. For this reason, the physiotherapist needs a thorough knowledge of the intervertebral joint and its surrounding musculature for correct diagnosis and appropriate treatment. Without this, the cause of pain may be overlooked, as often, gross active movements of the spine may remain full range.

Keywords: **Diagnosis; Intervertebral Disk; Joints; Spine**


Mobilising exercises used to decrease flexion deformities at the knee and hip in the elderly, have been found to have good effect on the hip, but relatively no improvement at the knee joint. Plaster wedging is a heavy and sometimes painful alternative. The authors investigate a fibreglass splint with a turnbuckle behind the knee to gradually, and with less discomfort, increase knee extension range. The results are encouraging and suggest considerably better correction than with wedging. Explanation of how to make this splint is given.

Keywords: **Knee; Knee Joint; Splints**

The physiotherapist has a very important role in the successful and complete care of childbirth. For normal labour, preparation must include mental relaxation and voluntary relaxation of skeletal musculature. Pain is commonly felt in the lower back and abdomen. With training of how to control the abdominal and pelvic muscles, many of the anticipated difficulties can be avoided.

Keywords: Labor; Obstetrics; Pain


During the prenatal period, exercises for the muscles involved in childbirth, breathing exercises, relaxation techniques and labour positions are all important preparation. With a prior knowledge, and support by a cohesive team, a non problematic labour is more likely. Post-partum, the physiotherapist's role is to assist the mother to regain her strength and physical fitness.

Keywords: Exercise; Labor; Obstetrics; Postnatal Care; Prenatal Care


Cerebrovascular disease, cervical disc degeneration, degenerative disorders including Parkinson's disease and motor neurone disease, and peripheral nerve diseases are among the more common neurological disorders seen in the middle age group. The causes and effects of these neurological disorders are discussed, as well as the role of physiotherapy in their rehabilitation.

Primary muscle diseases and emotional disorders including tension headaches are also considered.

Keywords: Cerebrovascular disorders; Motor Neuron Disease; Neurology; Parkinson Disease; Peripheral Nerve Diseases


Emphysema is considered to be an irreversible obstructive lung disease. This paper discusses the effects of physiotherapy treatment on a small group of emphysematous patients, and the management program integrated with medical treatment for effective care. The results suggest that benefits, whether physiological or psychological, are gained from treatment.

Keywords: Emphysema; Lung; Respiration Disorders


Myopathy and muscular dystrophy can be very disabling diseases that are not commonly seen. This paper discusses the value of treatment and how physiotherapy intervention, in particular passive mobilisation can be extremely important in the effective management of those who suffer these progressive diseases of muscle. The importance of a controlled diet and overall management are considered.

Keywords: Motion Therapy, continuous passive; Movement; Muscles; Muscular Diseases; Muscular Dystrophy

There is an apparent reluctance to accept spinal manipulation as a form of treatment, perhaps because of a lack of adequate training in how to successfully carry out the specialised techniques. The author discusses the two main forms of manipulation, that originated by Cyriax and Stoddard, and a more localised form known as osteopathic manipulation. It is agreed that, to fully understand manipulation, teaching of both methods is essential.

Keywords: **Manipulation, orthopedic; Movement; Spine**


Complications including oedema, neuroma and poor stump healing and moulding can cause considerable delays between amputation and the fitting of a prosthesis. This can also lead to secondary complications such as contractives and atrophy. The authors discuss an ischial bearing appliance that allows walking and postural re-education to begin much earlier, as the condition of the stump is not relevant. Application of this appliance as well as the patella bearing pylon are discussed. Its aim is not to take the place of an artificial limb but to bridge the gap.

Keywords: **Amputation; Amputation Stump; Artificial Limbs; Prosthesis**

Interruption of the nervous pathways anywhere between the periphery and the cerebral cortex may result in the subjective sensation known as "phantom limb". This phenomenon most commonly occurs after amputation but may also be a result of an interruption without amputation. The most common of these subjective sensations is pain, but other sensations including heat, tingling and tearing are common.

Movement may bring on pain from the phantom limb, affecting a person's daily mobilisation and activities of living. Other characteristics of this phenomenon are discussed and treatment of phantom pain is considered.

**Keywords**: Amputation; Pain; Prosthesis; Sensation


Resuscitation is considered to mean the "restoring to life, consciousness, vigour". Oxygen is essential for life, and adequate oxygenation of vital organs especially the brain is paramount. To effectively resuscitate, a clear airway must be achieved and maintained and respiration restored.

If respiration is depressed or inadequate artificial inflation is required to maintain adequate oxygenation to all tissues. This paper discusses effective resuscitation and considers complications to the vital necessity.

**Keywords**: Oxygen; Resuscitation; Respiration


The role of the physiotherapist is to effectively treat the patient, by communicating all relevant information and encouraging the patient to be an active participant in their own care.

Communication skills are imperative to effective learning. There are many barriers to skilled communication, including decreased clarity, poor concentration on the part of the patient, a decreased interest by the physiotherapist. Lecturing, tutorials, practical sessions and discussion groups are discussed as some of the more common methods of teaching.

**Keywords**: Communication; Education; Professional-Patient Relations


This paper examines the rate and distribution of Hydatid disease. Hydatid disease can be transmitted to humans, most commonly via sheep. Symptoms and signs, and percentage of population affected is discussed.

**Keywords**: Cysts; Echinococcosis; Sheep

Physiotherapy practice has come a long way due to its inspiring foundations in the past. Preventative medicine has assisted in this progression, plus improved methods of treatment which has given rise to hope by the patient of more effective care. Rehabilitation including neurological, spinal injuries and amputees, and management of trauma, and joint manipulation are amongst the latest developments in specialty areas.

Keywords: Joints; Massage; Physical Therapy; Preventive Medicine; Rehabilitation


Hydatid cysts may expand in size, rupture and can eventually lead to death or severe morbidity by destruction of vital organs in the body. These cysts may be removed by dissection or by aspirating the fluid. Surgical procedures and complications are discussed.

Keywords: Cysts; Echinococcosis; Surgery


Two hundred and eighty head injuries are admitted to the Royal Hobart Hospital on average, per year. This article looks at the management of the severe head injury, that takes precedence over administering often ideal treatment to any other injuries sustained.

Anatomy of the brain is discussed, and in particular, the importance of abnormal tone, which is particularly relevant to the physiotherapist.

Mechanisms of head injury including direct injury, deceleration forces and shearing rotational forces are considered. Effective rehabilitation is essential for the optimal chance of recovery and return back to the community.

Keywords: Anatomy; Head Injuries; Brain; Coma; Consciousness; Rehabilitation


The advance of modern society is dependent on research. The discovery of new knowledge or just the confirmation of pre-existing thoughts are imperative to the continuing growth and education of our society.

The process of research is dynamic in that it encompassed the discovery of new knowledge, which promotes discussion and sometimes controversy, often leading to further investigation.

Keywords: Education, medical; Research; Research Design


The majority of patients referred for physiotherapy suffer from a back injury. Despite the common occurrence of back problems, a positive response to treatment can be more difficult to achieve.
This paper considers exercise therapy for soft tissue injuries, with particular reference to the two more commonly chosen exercise modes of treatment. These two diametrically opposed schools of thought must be more adequately understood, so that balance between both muscle groups can occur, allowing interplay in the functioning of the back.

Keywords: Backache; Rehabilitation; Spine;


Weights and pulleys provide a relatively simple method of performing a variety of exercises. The amount of work can be effectively monitored, and as improvement occurs, progression through active work to resistance can be achieved.

It is however, difficult to effectively set up a system for activity of smaller muscles such as the hand. This article considers an apparatus which is a modified weights and pulleys system suitable for hand and finger exercising.

Keywords: Hand; Muscles; Rehabilitation


The hand is essential to our effective daily functioning. The manipulation skills of the hand, plus its ability to effectively grade movements and vary control depending on what needs to be picked up, further emphasises the importance of the hand.

This article considers the anatomical features of the hand and the management of some of the more common injuries. Psychological care and support of the patient with a hand injury is imperative to successful rehabilitation, as recovery is often slow and results in an inability to work and perform normal activities.

Keywords: Hand; Rehabilitation


Effective management of chest injuries will result from clear aims and principles of chest care. Adequate pre-operative management is essential for successful post-operative care.

Inadequate pain management can cause ineffective coughing and lead to chest complications. In this situation, effective splinting may be necessary to ensure chest clearance. Techniques including postural drainage and early ambulation are important factors in the prevention of deformity and achieving normal chest function.

Keywords: Cough; Respiration; Respiration Disorders

Traditionally, heat has been the treatment of choice to relieve pain. However, more recently, cold has been the preferred option for relief of muscle spasm and pain. This change has been supported by research, demonstrating that cold raised the threshold stimulus of the muscle spindle. The application of cold for the relief of muscle spasm and conditions including multiple sclerosis, that have shown positive results, are considered.

Keywords: Cold; Ice, Joints; Multiple Sclerosis; Muscles


The more common forms of pain relief include such methods as ice, vibration or percussion and anodal and cathodal galvanism. Cautery and sinusoidal current may achieve similar results with much cheaper and more simple methods. Techniques of application of these counter irritants, and indications for treatment, are discussed, as are the influence of afferent stimuli breakthroughs for the effective management of pain relief.

Keywords: Electric Stimulation Therapy; Ice; Pain


There is an apparent reluctance to accept spinal manipulation as a form of treatment, perhaps because of a lack of adequate training in how to successfully carry out the specialised techniques. The author discusses the two main forms of manipulation, that, originated by Cyriax and Stoddard, and a more localised form known as osteopathic manipulation. It is agreed that to fully understand manipulation, teaching of both methods is essential.

Keywords: Manipulation, orthopaedic; Movement; Spine
Volume 11. 1965


The use of sputum volumes and colour as indicators for instituting treatment and assessing efficacy of treatment are studied in 30 inpatients. Results indicate that comparative observations of sputum purulence should be made at comparable times of the day, probably morning, but for prediction of total volume, collection must be continued for the whole 24 hours.

The authors discuss the responsibilities of the physiotherapist and the relevance of results to outpatient practice and epidemiological surveys.
Keywords: Physical Therapy; Respiratory Tract Disease; Sputum


An extensive review of respiration, including subdivisions of function, the control of respiration and therapeutic measures in respiratory insufficiency, are discussed. The value of breathing exercises, cough drill and accurate postural drainage, given by a firm physiotherapist, is stressed.
Keywords: Clinical Pathology; Medicine; Respiratory Insufficiency; Respiratory Tract Disease


This single subject case report gives a detailed treatment of a patient following post-operative pulmonary thrombosis causing apparent death. The intensive physiotherapy treatment of breathing exercises, passive and active ankle and leg movements is described. Continuity of therapist and careful explanation to the patient is stressed.
Keywords: Physical Therapy; Pulmonary Embolism; Surgery


Historical change from electrical treatment, massage and passive therapy to active treatment, exercise and re-education is discussed, as are their advantages and disadvantages. An interesting description of the first pilot study on ultrasound and interferential treatment is included. The author postulates as to the usefulness of these treatments and concludes that therapists must keep an open mind and that clinical research presents the challenge to the physiotherapy profession.
Keywords: Electric Stimulation Therapy; Electromagnetic Fields; Physical Therapy

The practical treatment abilities of physiotherapists in a variety of medical conditions is acknowledged. The author stresses the need for a team approach to the patient. In addition, it is postulated that the physiotherapist spends more time with the patient and is in a good position to exercise a psychogenic approach to rehabilitation. Attention is drawn to the beginnings of rehabilitation of the elderly patient, in which a personal approach is paramount, and the fact that the physiotherapist can fill this role.

Keywords: Communication; Physical Therapy; Physicians; Professional Practice


A comprehensive review of the aetiology, pathological changes and treatments available for rheumatoid arthritis are discussed. The importance of splinting and appropriate exercise are stressed. The author concludes by noting the importance of basing advice and treatment on the foundation of fact.

Keywords: Medicine; Physical Therapy; Rheumatic Diseases; Surgery


The common aim of “encouraging the patient to self-help in his difficulties” is proposed, and advice on how this can be achieved is given by the authors. The development of psychiatric treatment in hospitals is discussed and the role of the physiotherapist in the Wallace Worth Clinic is specifically described.

Keywords: Communication; Mental Health; Physical Therapy; Professional Practice; Psychiatry


Maintenance of respiratory function in the unconscious patient is discussed with reference to positioning, maintaining full lung expansion, and use of respirators. The author notes that the two most common conditions treated are barbiturate poisoning and crushed chest injuries.

Keywords: Intensive Care; Mechanical Ventilators; Physical Therapy; Unconsciousness


A precise and detailed description of the aims and treatment of venous ulcers is presented. The need for elimination of oedema from the leg, improvement of the venous return and local stimulation of the ulcer is explained. Complications are discussed and general advice to the patient is outlined.

Keywords: Leg Ulcer; Physical Therapy

The need for the physiotherapist to fully understand the mechanism of pelvic pain and the nature of uterine action during parturition is stressed, and each of these mechanisms is discussed. The author proposes that an understanding of the personality and educational level of the patient is of paramount importance to maximise the benefit of antenatal instruction.

**Keywords**: Education; Obstetrics; Pregnancy


The emphasis on function and early mobilisation and ambulation of orthopaedic patients is praised and detailed treatment given for various conditions: fractures of tibia, femur and forearm; patellectomy and flexor tendon grafting. The author discusses the use of faradism in effectively aiding the problem of oedema post-operatively. The importance of early detection of congenital dislocation of the hip on babies is discussed.

**Keywords**: Orthopedics; Outcome Assessment; Surgery


The response of the adrenal and pituitary glands, to injury elsewhere in the body, is discussed. The increased secretion of corticosteroids and aldosterone, the protein catabolism and resulting poor appetite in the patient after injury are all detailed. The effects of metabolic adjustments of sodium and potassium ions are also mentioned. The author comments on the need for awareness of biochemical adjustments in case they become abnormal.

**Keywords**: Metabolism; Physiology; Wounds and Injuries


A fundamental treatment of increasing intra-abdominal pressure by a muscle bracing technique is presented. This bracing refers to a static actions of trunk muscles working harmoniously to stabilise the lumbar spine as one unit. The theory and method of training is described. The results in 750 patients have shown 86 per cent success rate in treating a variety of problems: congenital abnormalities, osteoarthritis of the spine, disc lesions and postural defects. Electromyographic studies have substantiated the muscle groups that are working.

**Keywords**: Lifting; Physical Therapy; Pressure; Spine


Essential steps of assessment, thorough muscle testing, recognition of tight structures, the degree of self correction and strengthening of the postural muscles as quickly as possible are proposed. The
treatment techniques of "stretch" and "shunt" are then described in detail. Some causes of scoliosis are discussed and the author comments on the need for constant re-evaluation of both the condition and the treatment.

Keywords: Medicine; Physical Therapy; Scoliosis; Spinal Abnormalities; Surgery
Volume 12. 1966


This extensive article discusses the predisposition to particular injuries in certain sports and the preventative measures that are involved. The author comments on the importance of early diagnosis and treatment. The types of injuries, and the principles of rest, reduction and prevention of swelling, early active exercise and gentle stretches are described. The need for close cooperation between club coaches, doctors and therapists in developing an appropriate training program is stressed.

Keywords: Diagnosis; Exercise; Sport; Sports Medicine


The author discusses the relative place of flexion and extension exercises in the treatment of one of the most commonly referred conditions seen by physiotherapists, low back pain. The author comments on the need to aim for restoration of power, endurance and a rapid strong contraction to enable response to unexpected pain. Resting and working conditions are discussed and a detailed survey and questionnaire are presented.

Keywords: Backache; Lumbosacral Region; Pain; Spine


The use of a prototype mechanised tilt table to address retraining postural adjustment and cervical traction in weak or paralysed patients is proposed and described. Design criteria and a brief description of the table, with reports on six months of practical usage, are described.

Keywords: Posture; Spine; Traction


The value of exercises in the management of obstetric patients is discussed. Some manuscripts are commented upon, but the author clarifies the usefulness of the exercise as related to its purpose on the physiological and anatomical basis. Justification of posture corrections, abdominal muscle exercise, pelvic floor exercises and pelvic rocking for mobilising a painful back are given. The author comments that the same exercises should be given pre and post-natally and that their main effect is to minimise the structural burdens on the body imposed by pregnancy and parturition.

Keywords: Exercise; Obstetrics; Physical Therapy; Pregnancy


Primary dysmenorrhoea is defined, the condition is described and the most common causes of errors of posture and psychogenic factors are mentioned. Physiotherapy treatment follows the
findings of Dick et al (1959) and treatment aimed at addressing mental and physical relaxation and aiding venous return as proposed by Heardman and Randell.

Keywords: Dysmenorrhea; Gynecology; Pathology


A description is given of the accurate interpretations of physiological knowledge applied to proprioceptive neuromuscular facilitation techniques by Professor MS Rood.

The detailed description of the means by which musculotendinous receptors can be activated by stretch has been outlined by the author in the hope of a better understanding of the value of stretch in re-education.

Keywords: Exercise; Muscles; Physical Therapy; Physiology


The history of sporting involvement by spinal paraplegics both internationally and nationally are discussed. The field events that are included in the Paraplegic Games are described and the classification of competitors is presented. The discussion on the recreational value of paraplegic sport includes the educational and cultural aspects. The benefits from the formation of the first Australian Paraplegic Sports Club in New South Wales in 1961 are described.

Keywords: Exercise; Recreation; Spinal Cord Injury; Sport


The author discusses the highly complex mechanism of movement control and acknowledges that it is only partially understood. The so called high command of movement is postulated as being in the motor cortex and linked to the consciousness. This high command is considered capable of training lower centres and imprinting a pattern of automatic action which it may instantly interrupt or alter. In disease or injury, the challenge to physiotherapists is to help the high command re-establish control.

Keywords: Motor Activity; Motor Skill; Neurophysiology


The types of nerve lesions and the principles governing repair are discussed. Indications for surgery and factors which influence recovery are commented upon. Closed nerve lesions, with specific reference to the main nerves of the upper limb and Bell's palsy, are described in detail.

Keywords: Medicine; Neuropathy; Peripheral Nervous System Disease; Physical Therapy

A scheme for eliminating many of the stump difficulties following lower limb amputation is discussed. The principle of an appliance being fitted within 24-48 hours of surgery is followed. The advantages are discussed and include reduced oedema, retention of the normal walking pattern and reduced psychological trauma. The technique is described in detail and particular attention to balance and transfer training is recommended. The authors comment that patients are able to return to work within one month.

Keywords: Amputation; Early Ambulation; Peripheral Vascular Disease; Physical Therapy


A method of cervical traction using purchase through the maxilla, to avoid compression and discomfort on chin and cheeks, is described. The technique of application is discussed and the advantages and disadvantages are compared.

Keywords: Cervical Vertebrae; Physical Therapy; Traction


The author describes a technique of cervical traction which has had a 90 per cent success rate in patients. Detailed application of treatment is given for two patient groups, acute and chronic.

Keywords: Cervical Vertebrae; Physical Therapy; Traction


This report, by members attending this course, was written to inform other physiotherapists of the importance of spinal manipulation within the profession and the high standard of this postgraduate training. A description of the course format was given by the authors.

Keywords: Education; Physical Therapy
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Intrinsic lesions of the shoulder joint are discussed, particularly those occurring in the soft tissues. The author describes what is considered the routine examination of the shoulder, according to the method of Cyriax. Types of shoulder lesions, including supraspinatus tendonitis, subacromial bursitis and capsulitis are described and the most appropriate treatment is discussed. The author comments that the shoulder joint is difficult to treat, and that some techniques may make it worse, but with good clinical examination and rest when indicated, good results are obtainable.

Keywords: Physical Therapy; Shoulder Joint; Soft Tissue Injuries


The author describes the stages involved in testing and releasing a new drug commercially. It is stated, however that adverse reactions can still occur and these can be classified as drug intolerance, drug idiosyncrasy, drug allergy or drug interaction. Reactions which occur can include disorders of the skin, blood, liver or behaviour. Common groups of drugs, including those used in rheumatic diseases, hypertension, psychiatry and infection are all capable of causing reactions and these are discussed. The author recommends that extensive investigation of the drug before commercial release should be mandatory.

Keywords: Adverse Effects; Drugs; Pharmacology


It is only recently, since 1935, that childbirth has been regarded as safe. Prior to that, infection, haemorrhage and obstructed labour had been common causes of mortality. Various diets, exercises and modes of life were followed in an attempt to decrease the high death rates, with the idea that if labour could be made natural, quick and pain free, safety would improve. In the 1930's prenatal as well as postnatal exercises were suggested and Grantly Dick Read (1933) introduced the psychoprophalactic method of childbirth which maintained that painful obstructed labours were largely of psychological origin. The author states that pain is a normal feature of labour and the aim of childbirth education should be to produce a patient who does not fear the unknown and can give a limited amount of co-operation.

Keywords: Obstetrics; Physical Therapy


Seventeen babies with bilateral talipes equinovarus and 12 with unilateral talipes equinovarus were treated with a combination of manipulation, stretching and the Denis Browne splint with the buckle and strap method. Of these babies, 8/17 of the babies with bilateral deformity were corrected and maintained this, 5/17 relapsed or not corrected, and 4/17 deceased or lost. The babies with unilateral deformity, 6/12 had a maintained correction, an 1/12 relapsed and 5/12 deceased or lost. A detailed description of the splints and their application is given.

Keywords: Pediatrics; Physical therapy

A survey of cases of fractures of the femur which were given operative treatment and metal fixation over a four year period, was completed. This article summarises the treatment, time involved, and eventual rehabilitation. All cases with two exceptions progressed rapidly. Patients with slipped epiphyses gained full range of activity, whilst patients with fractures of the femoral neck and prostheses inserted achieved independent activity after eight days. Those patients whose fractures were pinned and plated reached this stage after four months. Patients with trochanteric fractures were fully weight-bearing within three months of operation and those with fractures of the femoral shaft in up to four months.

Orthopedic Surgery; Physical Therapy


Drugs commonly used in the management of patients with chronic obstructive airways disease and thoracic surgery are described. These include bronchodilator drugs, expectorants, enzymes, mucolytic agents, detergents, antibiotic therapy and steroid drugs. Routes of administration, including oral, parental and aerosol, indications and effects are discussed.

Keywords: Pharmacology; Thoracic Diseases


Pain is a normal physiological accompaniment of labour and is not due to an inadequate psyche, as was considered in the psychophrophalactic method of childbirth. The author comments that antenatal preparation can affect the reaction pattern of the patient in labour, but does not decrease the actual amount of pain sensation. The value of antenatal preparation lies not in the direct effect on labour pain, but in the education and reassurance provided and the exercises prescribed.

Obstetrics; Physical Therapy; Relaxation Technique


The characteristics of the curves of normal innervation, partial denervation, and complete denervation are described. The normal variation in values, and the influence of certain aspects of technique on the strength duration curve are included, for without an appreciation of these factors it is likely that the curves will be interpreted inaccurately. In the author's opinion, strength duration testing is not used as often as it could be, which may be due to a lack of appreciation of the possible uses of its proven accuracy.

Keywords: Nerve Conduction; Peripheral Nervous System

The effectiveness of diaphragmatic breathing (DB) was assessed by comparing [1] two groups of patients with respiratory disease and [2] 100 normal physiotherapy students and staff. The 38 respiratory patients were divided into two groups with both being given Alupent via IPPB, steroids and the first group, DB. Improvement was assessed by measurement of FEV$_1$ and FVC. It was found that in Group 1 there was a 33% improvement compared to a 25% improvement in Group 2, whilst 16% deteriorated as compared to 32% in Group 2. When comparing the vital capacity in normal subjects during normal chest movement and DB, a 25% reduction in vital capacity during diaphragmatic breathing was found. X-ray screening of staff members showed that the excursion of the diaphragm was unchanged between maximal normal chest movement and DB.

Keywords: Physical Therapy; Thoracic Disease


This paper examines the beginnings of physiotherapy and rehabilitation, from China over 5,000 years ago. The author described, how, hand in hand with medicine, almost unbelievable progress has been made. Pioneers of the craft are discussed and local contemporary education is critically examined. The author claims that although current standards of professional competence and probity are high, there is still need to move forward, and engage in research and travel, as the status and standing of the profession is in our hands.

Keywords: Professional Competence; Rehabilitation


Sporting injuries encountered at the Lewisham Sports Clinic are described together with their treatment. The ankle joint, the knee and the acromioclavicular joint are all frequently injured and require knowledge of the function of the joint, together with the basic principles of rest and exercise. The personality of the sportsman is discussed with advice on ensuring rest is occurring.

Keywords: Physical Therapy; Sports Medicine


This study was undertaken in order to identify the effect of different methods of breathing encouraged in labour and the subsequent effect on end tidal CO$_2$. One subject was used and the following types of breathing were used: [1] Slow diaphragmatic breathing; [2] Fast shallow upper chest breathing 3] Fast deep upper chest breathing. Measurement of end tidal CO$_2$ was via a Godart Capnograph infra red CO$_2$ analyser. It was concluded from the measurements that shallow fast breathing caused no loss of CO$_2$, whilst fast deep upper chest breathing decreased CO$_2$ to 21 mmHg.

Keywords: Obstetrics; Physical Therapy; Pregnancy

The author questions as to whether continuing education for professionals is necessary. The various factors which may influence a practitioner in beginning education are discussed. It is suggested that further education be made mandatory for continuing registration, particularly with the extreme growth of knowledge in the profession.

Keywords: Competency-based Education; Continuing Education


The construction of examination papers requires considerable preparation and thought. It is recommended that in setting examination papers, it is necessary to carefully analyse the course content and objectives, improve validity and reliability and carefully analyse the performance to reveal the extent to which the examination achieved its stated objectives.

Keywords: Education; Educational Assessment; Examinations


In order to teach effectively, it is necessary to state objectives in measurable and observable terms, select teaching strategies appropriate to the objectives and select evaluation devices appropriate to both the objectives and the strategies. The author states that progress has been made in defining objectives, but little is known about positive teaching strategies that are needed.

Keywords: Education; Educational Assessment; Educational Models


Advice is given to the lecturer about assisting new tertiary students to adjust to university. The author recommends specific lectures on how to study, advice about constructing summaries, recasting knowledge under different headings, taking every opportunity of relating practical work to theory, arranging staff-student discussions on how to study and following student progress by personal tutors assisting a small number of students.

Keywords: Education; Educational Psychology


This paper has attempted to relate the teaching of normal movement to educational psychology in the new physiotherapy undergraduate. Interpretation of the terms "knowledge" and "thought processes" are discussed, as well as evaluation of student performance.

Keywords: Educational Assessment; Educational models; Physical Therapy

The paper summarises the research laboratory is set up in physiology, with streams of research, each with a leader and how education for junior researchers is given, in order to develop them into creative thinkers who would in due course act as a research leader in another unit. The author states that recently a spirit of inquiry had entered into physiotherapy and this was necessary as much of treatment was empirical. There are many areas to investigate in physiotherapy and undergraduate courses should be scientifically based in order to allow physiotherapists to undertake higher degrees towards research.

Keywords: Education; Physiology; Research


The development of a degree course at the University of Queensland is outlined. Two courses are currently available: Course A which has a strong science basis, and Course B which has a psychology basis. Honours and Masters degrees are also available, which encourages the development of research methods.

Keywords: Education; Physical Therapy
Electrodiagnostic techniques, if properly employed by those trained to use them, play a very significant role in the assessment of peripheral nerve injuries. Information of diagnostic and prognostic value may be obtained from strength-duration curves; electromyography and nerve conduction studies provide a more sensitive index of neuromuscular function, and a means of localising the site of nerve injury.

Keywords: Nerve Conduction; Nerve Degeneration; Peripheral Nervous System


Keywords: Elbow Joint; Physical Therapy


This article considers the various types of patients that can be encountered in psychiatric institutions. The author describes the benefits that physiotherapy treatment may produce in various types of patients encountered in these institutions, including both children and adult. The author also stresses the sparse number of physiotherapists actually employed in these institutions, and discusses the philosophy of providing treatment for these patients when there a general shortage of physiotherapists.

Keywords: Physical Therapy; Psychiatric Hospital; Psychiatry


This paper describes the application of the various treatments to the child with cerebral palsy or and/or mental retardation. The emphasis is on movement patterns, following the milestones of normally developing children and using treatment which can be done without active co-operation on the part of the patient. The latter is seen as important as treatment should be established as early as possible, even in a young baby.

Keywords: Cerebral Palsy; Physical Therapy


In a survey designed to discover the conditions most amenable to sinusoidal current, it was found
that post amputation pains, pain resulting from trauma to more superficial tissues, pain arising from local joint sprains and pain from rheumatoid joints responded best to this treatment. Of these 27 patients, 21 had maximum relief at the first treatment. It was concluded that the duration of symptoms did not affect the response to treatment, but the percentage of patients who responded were higher in the acute group.

Keywords: Pain; Physical Therapy


Thirty patients with acute neuritis of upper and lower extremities were included in this study. Ultrasonic therapy with a commencing dose of 1/2 watt per square centimetre was used and the following results were found. In 21/30 and 30/30 patients loss of pain and reduction of pain respectively were achieved. While only 6/30 patients attained loss of swelling, 30/30 had a reduction of swelling. Partial return of motor power and sensation was noted in 5/30 and 6/30 of the patients and there was full return of power and sensation in 2 patients. Conclusions were that ultrasound is an easy and effective way to bring relief to leprosy patients.

Keywords: Leprosy; Neural Leprosy; Physical Therapy


The use of various plastics is discussed and two simple methods of making plastic appliances are described. Such appliances are cheap and can be worn the same day. New approaches to design are advocated in a medium so well suited to encourage movement. Examples are given of active splints which bring about redistribution of muscle tone by influencing body position, and encouraging more normal postural sets, for specific corrective resistance exercise equipment for the rheumatoid hands, and for the use of plastic for active serial splinting.

Keywords: Rheumatoid Arthritis; Splints


The concept of Bobath treatment in cerebral palsy is discussed, together with consideration to the problems involved in cerebral palsy. The author emphasises that the essential deficit is the lack of the postural reflex mechanism. The aims of the method of treatment is to obtain more normal muscle tone and to improve co-ordination of posture and movement.

Keywords: Cerebral Palsy; Physical Therapy Methods


This paper discusses the treatment method of Rood, and is based on the acceptance of two fundamental points i) that receptors may be activated or deactivated during therapy ii) that such changes in receptor activity can affect motor function (whether somatic or autonomic in nature) and mental function. The author maintains that explaining the philosophy of Rood's work is essential in order to understand the topic.

Keywords: Motor Activity; Physical Therapy

The aims of this study were to compare the treatments of 1] The Bisgaard method, local pressure over ulcer and massage 2] The Bisgaard bandage and local pressure over ulcer 3] The Bisgaard bandage and local pressure over the medial perforating veins 4] The Quinaband-Diachylon bandage and local pressure over the ulcer. Results demonstrated that the rate of healing was increased in the Quinaband-Diachylon method, but this was not statistically significant. Control of oedema ie a decrease in circumference of the leg was evident in 4/6 of the Bisgaard group, and 3/8 of the Quinaband group. The rate of control of pain was unrelated to the type of treatment.

Keywords: Bandages; Venous Ulcer


There has been enormous growth in the extent of responsibility accepted by physiotherapists, particularly in the field of intensive care, thoracic medicine, heart surgery and trauma. This has led to an around-the-clock physiotherapy service at the Royal Prince Alfred and Royal North Shore Hospitals, staffed by junior physiotherapists in their first postgraduate year. Typical figures are quoted for night and weekend work and it is maintained that this postgraduate clinical learning is essential in the first postgraduate year.

Keywords: Manpower; Physical Therapy; Physical Therapy Department


This article describes physiotherapy at Royal Prince Alfred Hospital, Sydney in the 1930s. The workload consisted mainly of orthopaedics including a great deal of plaster work, spicas, jackets and tractions. The Physiotherapist in Charge was expected not only to carry a very heavy clinical workload, but also perform secretarial duties and teach students as there was no actual physiotherapy school at that time.

Keywords: Manpower; Physical Therapy; Physical Therapy Department


An emergency twenty-four hour physiotherapy service is provided at the Royal North Shore Hospital by the junior residents in their first year of training. The workload consists of mainly chest management and application of plaster of Paris. The method of application of a Colles fracture and collar and cuff are shown in detail. The care of the acute tetraplegic and the contribution of the junior resident to their management is also described.

Keywords: Physical Therapy Manpower; Physical Therapy Trends

Physiotherapists have an increasingly important role in the management of thoracic diseases. This includes a place in the therapy of both medical and surgical patients in hospital and in outpatients. Various methods for sputum elimination and prevention of carbon dioxide narcosis are presented. The physiotherapists should take part in the overall management of respiratory failure and can contribute greatly to the hospital team.

Keywords: Physical Therapy Methods; Thoracic Disease


The physiotherapist has had training which equips her to function fully as a member of the orthopaedic team. This includes chest care for tetraplegics or trauma cases, knowledge of splinting, regaining function of the limbs, or treatment of neurological disorders. This role should preferably be offered seven days a week, twenty four hours a week, and is ideally suited to the junior.

Keywords: Orthopedics; Physical Therapy

This paper describes the anatomy of the female pelvis, including bony structure, the pelvic muscles, the perineum and pelvic connective tissue of special importance. The functional significance of how these structures will be affected by pregnancy and labour is emphasised. It is stressed that due to increased levels of female hormones during pregnancy, joints may be more unstable and so the woman is more liable to experience mechanical disturbances or joint pain.

Keywords: Anatomy; Obstetrics


The process of normal labour, including the physiological processes that initiate labour are described. A discussion of the time course of labour, including physiology of uterine contractions and mechanical work performed by the uterus is also given. The techniques of breathing currently taught to patients are questioned as to their biochemical effect on the foetus.

Keywords: Labor; Physical Therapy


The physiology of normal pregnancy is, including the effect of oestrogen and progesterone on the uterus and vagina, and changes that routinely occur in connective tissue, posture, motion, metabolism, nutrition, and the cardiovascular and respiratory systems is described. Disorders that may transpire such as nutritional, circulatory and bowel and bladder disorders are also discussed. It is emphasised that although pregnancy is a normal physiological process, a number of normal changes may lead to frank pathology. Physiotherapy is therefore an important component of the management of pregnancy.

Keywords: Pregnancy, Complications


Pregnancy, whilst regarded as a normal biological phenomenon, is also an event of special significance. Previous studies have all agreed that during pregnancy all women experience an increase in anxiety or tension and also have both positive and negative attitudes towards pregnancy and the unborn child. The cause of these emotions and advice as to how staff can assist with these are discussed. Therapeutic implications for the areas of time relationships, personality and attitude on outcome of labour, natural child birth, and the puerperium are also considered.

Keywords: Pregnancy; Pregnancy, Complications


Current methods of reducing pain in labour are discussed. It is emphasised that the perfect analgesic should abolish or diminish pain and the memory of suffering, while in no way endangering or
harming the mother or child. Ideally the analgesic agent will not decrease uterine contractions nor prevent co-operation during the second stage. The author states that the answer to analgesia in childbirth is a combination of methods, such as explanation, relaxation and the use of drugs, rather than a complete separation towards one method.

**Keywords**: Anaesthesia and Analgesia; Labor; Obstetrical Analgesics


Common postnatal problems such as breast feeding, postoperative care after a caesarean, back pain, the perineum, abdominal muscles and family planning are discussed. The author emphasises that the physiotherapist has an important role in education of back care and exercise of the abdominal muscles.

**Keywords**: Physical Therapy; Pregnancy, Complications


The value of adequate examination in relation to pain has been emphasised. A general method of examination for the musculo-skeletal system has been outlined with reference to cardiovascular and respiratory signs and symptoms which may have bearing on pain or choice of treatment.

**Keywords**: Pain; Physical Therapy


This paper discusses the importance of understanding the physiology of asthma, in order to provide effective treatment. Specific aims for both the asthmatic and obstructive airways patient include, relaxation, clearing the airways of mucous, achieving relaxed breathing control, maintaining good posture and increasing exercise tolerance.

**Keywords**: Asthma; Respiratory Physiology


This paper aims to discuss general aspects of intellectual retardation, the physiotherapist's role in the treatment of children suffering the effects of this handicap, and to mention briefly some of the techniques and problems of physiotherapy for these children. Three specific areas, namely scoliosis, a chair for hydrocephalic children and feeding problems are discussed in greater depth.

**Keywords**: Mental Retardation; Pediatrics; Physical Therapy


Rehabilitation in Hungary is carried out in separate, specialised units, eg neurology, traumatology, rheumatology, with a medical practitioner qualified in that area. Treatment where possible, usually commences with subaquatic exercise, even for bed patients from the very early stages. Fractures are usually fixed with internal fixation and early ambulation is encouraged. There is a team approach
encouraged with occupational and work therapists, social workers and psychologists involved in the units.

Keywords: Physical Therapy; Rehabilitation


The role of the physiotherapist in ergonomics and in the prevention of disabilities is discussed, showing the factors which led to the study of working postures within the Physiotherapy Department of the University of Queensland. The economic relevance of the contribution made by a physiotherapist to a research team investigating tractor safety, is indicated. The technique of using photogrammetry as a method of measuring body movements for research into working postures is described in detail.

Keywords: Photogrammetry; Posture


This address to graduating physiotherapists, summarises the development of physiotherapy as a profession in Australia and the integration of training at various universities. In 1964, the Martin Report recommended that Physiotherapists should be taught primarily in Colleges of Advanced Education. The author describes the disadvantages of this method of education. The pattern of education in England, Canada and the USA are described and the current opportunities of employment, including researcher, teacher, clinical practitioner and administrator are outlined.

Keywords: Physical Therapy; Physical Therapy Education


On thousand muscle injuries at the Lewisham Sports Clinic, Sydney are described. The greatest number of lesions occurred in the lower limb, both in terms of strains and tears (the hamstring) and contusions (the thigh). Sports accounting for these injuries include football (especially Rugby League, athletes, ballet dancers, tennis and squash players. The clinic's method of treatment consists of progressive stretching to normal length and regaining strength in all types of injury.

Keywords: Muscles; Physical Therapy Methods; Sports


A survey has been made comparing the results of treatment of patients complaining of low back pain and pain resulting from low back conditions, by: [1] Heat, massage and exercise; and [2] Passive movement techniques of mobilisation and manipulation. The length of time taken to obtain an acceptable result by each method has also been compared. The results of the first two groups were not significantly different, although the number of treatments required to obtain an acceptable results, by mobilisation and an manipulation was approximately half the number required when treating by heat massage and exercise.

Keywords: Low Back Pain; Physical Therapy Methods

A description of the hamstring injury in Australian Rules football is given together with actual mechanism of injury, immediate treatment, home exercise, and progression of treatment. It is emphasised that in the clinical situation, it is necessary to reproduce the need of a patient during his maximal performance. The average player should be kept out of competitive sport for two to three weeks.

Keywords: Physical Therapy Methods; Sports


The signs and symptoms of cystic fibrosis are described, with a detailed explanation of pulmonary involvement. The aims of treatment, examples, and a home program are discussed in depth. The author emphasises the importance of a good prophylactic program and attention to pulmonary hygiene in order to maintain optimum pulmonary function.

Keywords: Cystic Fibrosis; Physical Therapy Methods


The author described the effect that impaired vision will have on perceptual and motor skills. She emphasises that loss of vision will occur in a great many patients, including accidents, cerebrovascular accidents, cerebral palsy, multiple sclerosis. plastic surgery of the face, explosions, head injuries and diabetes. A description of the faults commonly occurring due to poor vision are given together with some advice as to how to begin rehabilitation.

Keywords: Blindness; Physical Therapy Methods


The history and development of connective tissue massage are described. diagrams of reflex zones and suggested uses for this treatment are suggested. The suggested basis and actual techniques, including possible reactions are also described.

Keywords: Massage; Physical Therapy Methods


The Milwaukee Brace for conservative treatment of scoliosis is described. In most cases, this is applied until surgery or after a corrective plaster jacket. The manufacture, fitting, adjustment and use are described in detail.

Keywords: Orthopaedic Devices; Scoliosis