

Prosthetists and Orthotists- Profession specific descriptor for registered professionals and support workers

Prosthetists provide gait analysis and engineering solutions to patients with limb loss. They treat patients with congenital loss as well as loss due to diabetes, reduced vascularity, infection and trauma. They play a significant role in supporting the health and wellbeing of individuals and in rehabilitation, usually working closely with Physiotherapists and Occupational Therapists as part of multidisciplinary amputee rehabilitation teams. Orthotists provide gait analysis and engineering solutions to patients with problems of the neuro, muscular and skeletal systems. They design and provide orthoses that modify the structural or functional characteristics of the patient's neuro-muscular and skeletal systems enabling patients to mobilise, eliminate gait deviations, reduce falls, reduce pain, prevent and facilitate healing of ulcers. They treat patients with a wide range of conditions including diabetes, arthritis, cerebral palsy, stroke, spina bifida, scoliosis, MSK, sports injuries and trauma. They play a significant role in supporting the health and wellbeing of individuals and in rehabilitation, usually working closely with Physiotherapists and Occupational Therapists as part of multidisciplinary teams such as within the diabetic foot team or neuro-rehabilitation team.

Wider Determinants

Orthotists have embedded telehealth into their practice, reducing the footfall through the hospital, reducing the carbon footprint of the service, which also improves the air quality in the local population and aims to contribute to the government's Net Zero targets and helps reduce air pollution.

The provision of a prosthesis or orthosis can be the difference between independent living and being dependent on others for basic care. Prosthetists and Orthotists enable people to live an independent life by providing an upper limb prosthesis enabling the person to prepare food independently and take charge of their hygiene and self-care requirements. Providing a lower limb orthosis to people with neurological disorders enables them to continue being ambulant, allowing them to partake in social activities and opens new employment opportunities which would not be accessible otherwise.

The provision of prosthetic and orthotic devices supports children's access to education and other associated activities. Prosthetists and Orthotists can also carry out appointments in a school setting for children with special educational needs and disabilities where they see the child and educate their teachers and support workers about their needs so that the child doesn't miss time at school. People with learning disabilities have poorer physical and mental health, and barriers to healthcare stop people with a learning disability from getting good quality healthcare. Treating the child in their school setting, educating the teaching/support staff about the child's physical needs and their orthosis/prosthesis, and working as part of the multi-disciplinary team within the school all help reduce this health inequality.

People with a learning disability have worse physical health than people without a learning disability. The provision of a prosthesis/orthosis improves mobility and increases independent accessibility to a wider variety of health settings, also enabling them to live independently in a wider range of housing accommodations and increases mobility, protecting against pathologies associated with sedentary lifestyles.

Health Improvement

Prosthetists and Orthotists work in multi-disciplinary teams enabling them to refer service users directly to the correct service reducing the delay in treatment. They also work closely with other professionals to ensure the service user has the best outcome. This ensures the service user is not only treated for their prosthetic/orthotic needs but also for needs outside of the initial referral and is able to reach allied services efficiently and effectively.

Prosthetists and Orthotists provide advice and signposting about wider health areas like advice about physical activity, weight loss, and ways to keep well. Prosthetists and Orthotists take a person-centred approach to their work and often work with service users over their lifetime. This puts them in a unique position, allowing them to follow a service user throughout their life journey and build long-lasting relationships. These relationships allow them to better understand their needs and to recognise changes in behaviour, demeanour and personality which are key to recognising safeguarding issues, mental health issues and disorders which impact memory and personality.

Making Every Contact Count (MECC) is key to prosthetic and orthotic consultations. Prosthetists and Orthotists regularly offer information about physical and mental health and wellbeing. They work with service users throughout their lives; thus, they are uniquely placed to have conversations about wider health and wellbeing areas and signpost service users to useful services.

Limb loss impacts a person's self-image and self-confidence; prostheses enable amputees to take part in society. Specialist adaptations are made to prosthetic and orthotic devices to support service users with their lifestyle, e.g., a prosthetic partial hand to use during prayer enables people to take part in religious activities that give meaning to their lives, which is incredibly important for mental health. Special torque controls on prosthetic legs allow users to play golf, and orthoses/adaptions enable children to learn, move or play sports, allowing them to take part in social activities, which is important for their self-esteem, self-image and well-being but also keeps them active which improves their physical health.

Many Prosthetists and Orthotists give talks to support groups and charities (e.g., support groups for people with rheumatoid arthritis, diabetes, or limb loss charities), where they share information about their services and the help they can offer, educating people on their health condition. These talks help to inform people about the support they can access and how they might benefit from them. Educating groups of people with specific conditions allows them to make informed choices about their health and encourages self-management. For example, educating diabetic users on daily foot health checks, and the importance of appropriate footwear to prevent ulcerations, infections, amputations, and hospital admissions.

Orthotics support workers can provide leaflets and wider health information to service users who come to the clinic, allowing them to access healthcare services beyond their initial needs. Common information given out refers to weight management or smoking cessation, and mental health support.

Orthotics support workers are part of wider research projects that investigate the benefits of orthoses to service user groups, for example, the benefit of knee braces for people on the waiting list for orthopaedic surgery. Orthotics support workers also provide shoe advice and insoles for hospital staff who need them to reduce pain while walking and allow them to work comfortably.

Population Healthcare

Prosthetists and Orthotists help educate people on health issues, contributing to health prevention. For example, educating school children on the effects of poorly fitting footwear on foot health. They also contribute to educational programmes on the effect of foot biomechanics on lower back pain, enabling people to seek conservative treatment and preventing potential long-term issues. This support enables people to remain in work, continue being active and contribute to their communities.

Health Protection

In response to the COVID-19 pandemic, Prosthetists and Orthotists started actively giving service users advice about vaccinations.

In response to COVID-19, orthotic support workers integrated additional cleaning between each service user to protect staff and service users.

Prosthetists and Orthotists also provide screening programmes, e.g., for neuropathy detecting foot health issues before they become acute and require hospital admission. This is a standardised procedure for all service users who present with diabetes.

Prosthetists and Orthotists – Wider Reading and Case Study Examples

Health Protection	Wider Determinants
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Population Healthcare

- Improving the quality of orthotics services in England

Health Improvement