



BRITISH
ASSOCIATION OF
CHARTERED
PHYSIOTHERAPISTS IN
AMPUTEE
REHABILITATION

AMPUTATION **REHABILITATION**

**GUIDANCE FOR THE EDUCATION OF
PRE-REGISTRATION PHYSIOTHERAPY
STUDENTS**

2013



The recommendations in this guidance are from the working party, on behalf of BACPAR, and not the Chartered Society of Physiotherapy

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INTRODUCTION and BACKGROUND

The British Association of Chartered Physiotherapists in Amputee Rehabilitation (BACPAR) is a professional network affiliated to the Chartered Society of Physiotherapy (CSP). BACPAR aims to promote best practice in the field of amputee and prosthetic rehabilitation for the benefit of patients, users and the profession. It is committed to research and education, providing a network for the dissemination of best practice in pursuit of excellence and equity, whilst maintaining cost effectiveness.

BACPAR first produced guidance for the education of undergraduate pre-registration physiotherapy students in 2000 with updates in 2003 and 2008. Please see **APPENDIX ONE** for original authors and contributors and for current update.

BACPAR has produced evidence based guidelines for clinical practice which will contribute to student learning and should be referred to in terms of facilitating teaching in the practice setting. See **FURTHER READING** in **ADDITIONAL RESOURCES**.

For the purpose of this document, the focus of physiotherapy and amputee rehabilitation is the person with lower limb loss. However, it should be noted that physiotherapy also has a role in the management of the upper limb amputee.



APPLICATION of GUIDANCE

1. Within the university setting

BACPAR acknowledges that higher education institutions (HEIs) have limited time available for every topic or specialist area within practice. This necessitates that the material delivered should be as relevant as possible. It is not the intention of BACPAR to dictate what is delivered at pre-registration level as it is appreciated that not every HEI can accommodate amputation rehabilitation as core material.

The purpose of this guidance therefore is to offer support and access to resources to those lecturers involved in planning and delivering this element of the student curriculum. BACPAR suggests that this, supported by further reading, should provide a sound theoretical basis to enable the student to work within the field of amputation rehabilitation.

2. On practice/ clinical placement (NB for the purposes of this document practice/ clinical placements and educators/facilitators/supervisors are referred to as 'placement' and 'educator').

Where students do have the opportunity to gain clinical experience in amputee rehabilitation in the practice setting, the education guidance can serve as a resource for educators, assisting with placement planning and the structure of teaching and learning opportunities to complement existing knowledge and skills. In anticipation and preparation for placement, educators can highlight relevant sections and learning outcomes to students, incorporate the self-rating competency tool (see **APPENDIX TWO**) and signpost to recommended reading and BACPAR evidence based guidelines.

LEARNING OUTCOMES

The learning experience

Learning outcomes should be identified and selected that relate to the type of learning experience. For most students the learning experience will take place within the university setting and consequently some of the learning outcomes are, by intent, relatively broad. However some students will also gain learning on placement; educators may identify further learning outcomes to those outlined in this document that are relevant and/or specific to the setting and opportunities available, for example in relation to the person with upper limb loss or absence or the child with limb loss.



PATHOLOGY

AIMS

**To give the student an understanding of the major causes of amputation.
To appreciate how the process of rehabilitation may be influenced by the causative condition.**

Learning Outcomes

By the end of the learning experience the student will be able to:

Peripheral Arterial Disease (PAD)

- Demonstrate knowledge of the anatomy of the peripheral arterial system and the most common sites of occlusion
- Discuss the pathophysiology of arteriosclerosis and relate it to the clinical presentation of PAD
- Identify common vascular investigations and surgical techniques for the ischemic limb
- Discuss the prevalence of PAD in the amputee population

Diabetes

- Discuss the presentation of the disease, its prognosis and its effect on the major systems of the body
- Outline how diabetes can predispose to amputation and influence management of the amputee
- Understand factors commonly effecting the management of diabetes (e.g. medical and patient control)
- Appreciate the effect of exercise on blood sugar levels and show awareness of the symptoms of hypoglycaemia and its management

Smoking

- Describe the short and long term pathological effects of smoking on tissue viability
- Explain how smoking can influence the processes that lead to amputation

Other Causes

- Outline how other less common causes lead to amputation



PRINCIPLES OF AMPUTATION

AIM

To enable to the student to gain an understanding of the rationale behind amputation surgery, know the different levels of amputation and the effect of amputation on subsequent mobility and function.

Learning Outcomes

By the end of the learning experience the student will be able to:

Investigations

- Show an awareness of the investigative procedures available to ascertain the viability of tissues

Levels of Amputation

- Discuss how tissue viability affects the decision on amputation level
- Demonstrate an understanding of psychosocial factors and the role of the patient in the decision-making process for amputation
- Demonstrate awareness of the different techniques for amputation
- Discuss how optimum residual limb length, shape and characteristics at different amputation levels can affect rehabilitation
- Discuss how the level of amputation may influence prosthetic provision
- Understand the importance to rehabilitation of the lower limb amputee with regards to the preservation of the knee and hip joints
- Identify some of the physical complications that may arise following amputation surgery
- Be aware of the common emotional and psychological reactions to amputation and demonstrate an understanding of the stages of the grieving process
- Show an awareness of congenital/limb deficiency



BIOMECHANICS

This topic should have been covered in other areas of the curriculum. However the subject should be reviewed so as to understand the context of neuromusculoskeletal implications of amputation surgery and subsequent prosthetic rehabilitation.

AIM

To provide the student with an introduction to the principles of biomechanics. To enable those principles to be applied to prosthetic rehabilitation in the lower limb amputee.

Learning Outcomes

By the end of the learning experience the student will be able to:

- Describe the cycle of physiological walking using recognised terminology
- Understand the principles of forces, centre of mass, moments, levers, equilibrium and work/energy as applied to the normal musculoskeletal system
- Discuss how these may differ for the lower limb amputee and broadly how prosthetic provision seeks to minimise gait deviations and optimise mobility



MULTIDISCIPLINARY MANAGEMENT

AIM

To provide an understanding of the importance of a holistic approach to rehabilitation following amputation and the role of the physiotherapist within the multidisciplinary environment.

Learning Outcomes

By the end of the learning experience the student will be able to:

- Identify the key members of the multidisciplinary team and discuss their involvement in the rehabilitation process
- Discuss pre and post operative multidisciplinary management
- Describe the role of the physiotherapist within the multidisciplinary team
- Discuss the role of the physiotherapist in the pre-op management of a patient who is about to undergo a lower limb amputation
- Describe the role of the physiotherapist in the management of a patient who has undergone a lower limb amputation
- Understand the principles of pre-prosthetic and prosthetic management
- Appreciate the mechanisms and importance of communication systems between services



ASSESSMENT

AIM

To enable the student to assess an individual undergoing amputation and have an understanding of the management of their physical, psychological and social needs.

Learning Outcomes

By the end of the learning experience, the student will be able to:

- Where applicable, perform a subjective and objective examination, in a timely manner and be able to discuss the content and its implications using appropriate terminology
- Discuss the significance of findings resulting from the assessment of the person requiring/following amputation of a lower limb
- Demonstrate the use of clinical reasoning to plan rehabilitation in light of assessment findings and the patient's individual goals
- Discuss how a patient's co-morbidities and prognosis may influence functional outcome
- Discuss how a patient's psychological, social and economic circumstances may influence the rehabilitative process and outcome
- Keep appropriate records in accordance with CSP Core Standards (2011) <http://www.csp.org.uk/documents/core-standards-physiotherapy-practice-csp> and HCPC (Health and Care Professions Council) Standards of Proficiency (2012)
- http://www.hpc-uk.org/assets/documents/10000DBCStandards_of_Proficiency_Physiotherapists.pdf
- Identify when to refer an amputee to relevant member/s of the multidisciplinary team
- Show awareness of the existence of appropriate guidelines to inform best practice and how to apply them

Prosthetic assessment

- Demonstrate an understanding of the decision making process leading to prosthetic use
- Understand why and when prosthetic use may not be appropriate and what alternatives may exist
- Discuss the factors affecting successful prosthetic use



PHYSIOTHERAPY TREATMENT and MANAGEMENT

AIM

To develop the student's ability to apply the principles of physiotherapy management to prosthetic rehabilitation.

Learning Outcomes

By the end of the learning experience the student will be able to:

- Discuss and apply (where applicable) treatment options in an effective & safe manner based on current best practice and evidence
- Demonstrate (where applicable) safe techniques and manual handling
- Understand and demonstrate (where applicable) the timely use of specialist equipment
- Devise appropriate exercises programmes
- Discuss alternative treatment and management approaches for non-prosthetic limb users
- Identify common challenges associated with amputees post operatively and their management
- Understand and discuss some of the issues relating to loss and bereavement in relation to limb loss
- Recognise that many core skills are applicable and transferable to this field of rehabilitation
- Select appropriate outcome measures to demonstrate effective intervention. See <http://www.csp.org.uk/publications/bacpar-toolbox-outcome-measures>
- Show awareness of the existence of appropriate guidelines to inform and apply towards best practice



EQUIPMENT

AIM

To familiarise the student with a range of equipment – including prostheses – and their use in the rehabilitation of patients following lower limb amputation.

Learning Outcomes

By the end of the learning experience, the student will be able to:

Risk Assessment

- Carry out (where applicable) an appropriate risk assessment and recognise/understand the inherent risk in the provision and use of specialist equipment
- Discuss the indications and contraindications of specific equipment used in the management and treatment of lower limb amputees
- Recognise the advantages and disadvantages of the various types of specialist equipment provided
- Understand local regulations and current government legislation relating to Health and Safety and Manual Handling
- Understand the professional responsibility of instructing/educating others (patients/clients/carers/relatives & other health professionals) in the safe use of equipment
- Recognise that many core skills are applicable and transferable to this field of rehabilitation

Wheelchairs

- Identify component parts of wheelchairs and explain their influences on posture, mobility, stability and performance
- Understand the importance of pressure relief and the means of achieving it
- Show awareness of the existence of appropriate guidelines and legislation relating to the provision of wheelchairs

Manual Handling Equipment

- Identify the range of equipment which aids manual handling of patients and independent patient transfers
- Demonstrate (where applicable) the safe use of commonly used manual handling equipment used within this patient group

Early Walking Aids

- Understand the importance of early walking aids as an assessment and treatment tool



- Identify and describe the different types of commonly used early walking aids
- Discuss and demonstrate (where applicable) the different applications of the commonly used early walking aids

Prostheses

- Identify types of prostheses for the most common levels of amputation
- Identify the component parts of a lower limb prosthesis
- Understand the importance of appropriate selection of prosthesis for the amputee and how this can influence the outcome of rehabilitation
- Understand the significance of weight distribution within the prosthetic socket
- Understand the relevance of effective residual limb oedema management in relation to prosthetic use. See <http://www.csp.org.uk/publications/clinical-guidelines-physiotherapy-management-adults-lower-limb-prostheses>
- Demonstrate (where applicable) how to don and doff a prosthesis

Walking Aids

- Identify the different types of walking aids and evaluate their appropriate use within the rehabilitation process in relation to the ability of the individual amputee and their influence on gait



ADDITIONAL RESOURCES

DISABLEMENT SERVICES CENTRES (DSC's)/ LIMB FITTING CENTRES (LFC's)/ PROSTHETIC/ REHABILITATION CENTRES

In its 'Learning and Development Principles' (2010) the Chartered Society of Physiotherapy recognises the range and diversity of settings for practice based learning. The physiotherapy student may experience amputee rehabilitation in one or more different settings including the NHS (acute, intermediate or primary care), social services, independent and private practice or voluntary sector. Many rehabilitation centres provide placements for pre-registration students.

Some centres also provide one or half day visits (individuals or groups) with the opportunity to see:

- Lower limb rehabilitation
- Upper limb rehabilitation
- Wheelchair and seating

In addition to meeting amputees there may be the opportunity to meet the multidisciplinary team, carers and potentially one or more of the following:

- Rehabilitation consultants
- Prosthetists and Orthotists
- Nurses (ward or clinic based, diabetic or tissue viability specialist)
- Physiotherapists
- Occupational therapists
- Counsellors / Clinical Psychologists
- Social Workers
- Rehabilitation engineers
- Podiatrists
- User groups

Where a visit to a relevant centre is not possible, students will benefit from a specialist physiotherapist contributing to the curriculum as a visiting lecturer via presentation and demonstration of aspects of amputee rehabilitation.



RECOMMENDED READING

Ainslie, T. 2012. The Concise Guide to Physiotherapy: Assessment and Treatment. Churchill Livingstone. Elsevier. Kidlington, Oxford
(Two volumes – Assessment and Treatment – Amputee Rehabilitation Chapter 2)

Atkins, K., Cole, M.J., Cumming, J and M. Donovan-Hall. 2010. BACPAR Toolbox of Outcome Measures. <http://www.csp.org.uk/publications/bacpar-toolbox-outcome-measures>

Blundell, R., Bow, D., Donald, J., Drury, S and L. Hirst. 2008. Guidelines for the Prevention of Falls in Lower Limb Amputees.
<http://bacpar.csp.org.uk/publications/guidance-falls-prevention-lower-limb-amputees>

Bouch, E., Burns, K., Geer, E., Fuller M and A, Rose. 2012. Guidance for the multi disciplinary team on the management of post-operative residuum oedema in lower limb amputees.
<http://bacpar.csp.org.uk/publications/guidance-multi-disciplinary-team-management-post-operative-residuum-oedema-lowe>

Brett, F., Burton, C., Brown. M., Clare, K., Duguid, M., Randall, T and D, Thomas. 2010. Risks to the Contralateral Foot of Unilateral Lower Limb Amputees: A Therapist's Guide to Identification and Management.
<http://bacpar.csp.org.uk/publications/risks-contra-lateral-foot-unilateral-lower-limb-amputees-guideline>

Broomhead P., Clark K., Dawes D., Hale C., Lambert A., Quinlivan D., Randell T., Shepherd R., Withpetersen J. 2012. Evidence Based Clinical Guidelines for the Physiotherapy Managements of Adults with Lower Limb Prostheses, 2nd Edition. Chartered Society of Physiotherapy: London.
<http://www.csp.org.uk/publications/clinical-guidelines-physiotherapy-management-adults-lower-limb-prostheses>

Broomhead P, Dawes D, Hancock A, Unia P, Blundell A, Davies V. 2006. Clinical guidelines for the pre and post operative physiotherapy management of adults with lower limb amputation. Chartered Society of Physiotherapy, London
<http://bacpar.csp.org.uk/publications/clinical-guidelines-pre-post-operative-physiotherapy-management-adults-lower-li>

Dawson I, Divers C, Furniss D. 2008. PPAM-aid Clinical Guidelines for Physiotherapists. Scottish Physiotherapy Amputee Research Group, Glasgow
<http://www.knowledge.scot.nhs.uk/sparg.aspx>

Engstrom B, Van de Ven C. (1999). Therapy for Amputees. 3rd Edition. Churchill Livingstone



<i>BACPAR Journal</i>	published biannually
<i>British Journal of Therapy & Rehabilitation</i>	published monthly
<i>Clinical Rehabilitation</i>	published monthly
<i>Physical Therapy</i>	published monthly
<i>Physiotherapy</i>	published quarterly
<i>Prosthetics and Orthotics International</i>	published three times per year
<i>Archives of Physical Medicine and Rehabilitation</i>	published monthly

VIDEOS

Access to training and product information for PPAM Aid:

'Customer Services, Ortho Europe Ltd,
Mill Lane, Alton, Hampshire GU34 2PX
Telephone: 01420 83294 Facsimile: 01420 80068
Email: sales@ortho-europe.co.uk
Website: www.ortho-europe.com

Access to training and product information for Femurett from Ossur:

<http://www.ossur.co.uk/pages/16186>

'Normal Walking – an overview based on gait analysis' Oxford Metrics Limited, 14 Minns Estate, West Way, Oxford OX2 0JB

<http://www.omgplc.com>

(Also other titles e.g. Principles of Pathological Gait & Running and Sprinting.
Payment in advance)

'Fundamentals of Human Walking' (video in NTSC format), Gait and Motion Analysis Laboratory, Moss Rehabilitation Hospital, 1200 West Tabor Road, Philadelphia, PA 19141, USA.

www.mossrehab.com

NB It may prove difficult to play a video in NTSC format. See

<http://www.guardian.co.uk/technology/askjack/2007/jul/05/watchinganntscdvdjustpres>
for advice.

'Gait Analysis and Training for the Transfemoral Amputee'

Available from: Rehabilitation Gymnasium, Douglas Bader Centre, Queen Mary's Hospital, Roehampton Lane, London SW15 5PN.



BACPAR

Departmental membership of BACPAR is available to University departments delivering pre-registration physiotherapy programmes. For details contact the Membership Secretary or see BACPAR website for details <http://bacpar.csp.org.uk/>

Student members are welcomed (favourable student membership rate). See BACPAR website for membership details <http://bacpar.csp.org.uk/>

BACPAR can arrange outside speakers for lectures, tutorials or workshops in the University if requested. For details contact BACPAR Education Officer.

BACPAR holds the following resources:

- 'Bibliography and Reference list – recommended resources'
- 'Resources Available for Research, Audit and Information' – a list of useful website addresses e.g. professional societies, voluntary organisations; evidence based databases, and relevant journals

Further learning resources available via the "Amputee Rehabilitation" network – documents – on interactive CSP <http://www.csp.org.uk/icsp>

BACPAR's Membership Secretary, Honorary Education Officer and Honorary Research Officer can be contacted via <http://bacpar.csp.org.uk/>

WEBSITES

BACPAR's website address <http://bacpar.csp.org.uk/> provides information about the organisation.

BACPAR also moderates the "Amputee Rehabilitation" network on interactive CSP <http://bacpar.csp.org.uk/>. This network is accessible to CSP Members and Allied Associate Members of BACPAR and provides a secure site for debate, information and peer support.

THE CHARTERED SOCIETY OF PHYSIOTHERAPY

CSP Information Resource Centre

- Journal Holdings listings
- Dissertation & Theses listings
- Book list
- Evidence Based Clinical Guidelines

Available via CSP Practice and Development, 14 Bedford Row, London WC1R 4ED.
Tel: 020 7306 6666.

Email : enquires@csp.org.uk



SCOTTISH PHYSIOTHERAPY AMPUTEE RESEARCH GROUP (SPARG)

The Scottish Physiotherapy Amputee Research Group (SPARG) was formed in 1991 and is an established network of all Senior Physiotherapists with clinical responsibility for patients who have had lower limb amputations in Scotland. SPARG audits the rehabilitation of these patients by collecting data using a standardised discharge summary form (DSF). The results are published annually and are available electronically from the SPARG website or directly from Helen Scott (see below). In addition, SPARG develops evidence based guidelines and initiates and runs research projects in the field of amputation rehabilitation. Further information on current projects and guidelines can be found on the website or by contacting Helen Scott.

Contact: Helen Scott, Chair SPARG, helen.scott@ggc.scot.nhs.uk

Website: <http://www.knowledge.scot.nhs.uk/sparg.aspx>

CHARITY/ SUPPORT ORGANISATIONS include:

The Murray Foundation

<http://www.murray-foundation.org.uk/>

The Limbless Association

<http://www.limbless-association.org/>

[enquiries@limbless-association.org/](mailto:enquiries@limbless-association.org)

LimbPower

<http://www.limbpower.com/>

The Douglas Bader Foundation

<http://douglasbaderfoundation.com/>

BLESMA (British Limbless Ex Serviceman Association)

<http://www.blesma.org/>

Limbcare

<http://www.limbcare.org/>

PORT-ER (Prosthetics, Orthotics & Rehabilitation Technology-Education and Research)

http://www.port-er.com/porter_home.html

REACH (Association for Children with Upper Limb Deficiency)

<http://www.reach.org.uk/reachcms/>

STEPS (Association for children with lower limb deficiency)

<http://www.steps-charity.org.uk/>



APPENDIX ONE

MEMBERS OF THE ORIGINAL WORKING PARTY 2000

- Phyl Fletcher-Cooke** – Physiotherapy Lecturer
Wakefield School of Physiotherapy
- Carolyn Hale** – Clinician and Clinical Educator
Robert Barnes Rehabilitation Centre
Central Manchester Healthcare NHS Trust
- Joanne McBrearty** – Clinician and Clinical Educator
Newcastle DSC
- Robert Shepherd** – Clinician and Clinical Educator
Chapel Allerton DSC
Leeds
- Additional support from:
- Kathryn Heathcote** – Physiotherapy Lecturer
Manchester School of Physiotherapy
- Clive Lilles** – Physiotherapy Lecturer
Birmingham School of Physiotherapy
- Fiona McLeod** – Clinical Link Tutor,
University of the West of England, Bristol.
(Previously of Aberdeen School of Physiotherapy)

DSC based Physiotherapists in United Kingdom

UPDATED MARCH 2003

UPDATED MARCH 2008

WITH CONTRIBUTIONS FROM

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Harold Wood DSC
- Penny Broomhead** – Clinical Specialist in Amputee Rehabilitation
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Chair of BACPAR

Jennifer Newell – Lecturer in Physiotherapy
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R.A. Shepherd – Clinician and Director
REHAB Prosthetics Ltd

UPDATED JANUARY 2013

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Jodie Georgiou – Senior Prosthetic Physiotherapist, Guys and St Thomas' NHS Foundation Trust, Community Services, Bowley Close Rehabilitation Centre.
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Peter Ross – Senior Lecturer, Physiotherapy School of Health & Social Work, University of Hertfordshire

Helen Scott – Team Leader Physiotherapist, Westmarc, Southern General Hospital, Glasgow



APPENDIX TWO

Clinical Competency Self-Rating Tool Physiotherapy and Amputee Rehabilitation

Name.....
Student: Year
HEI.....

Post/Band
Hospital/Trust.....
Date.....

Competence is defined as “*the possession of the necessary skills, knowledge, attitudes, understanding and experience...required to perform in professional and occupational roles to a satisfactory standard within the workplace*” (Day 1995).

The purpose of completing this self-rating form is to help guide the learning process during your placement/ rotation. It will be a useful tool for your own reflection and to guide you **and** your practice educator/ supervisor when setting learning objectives.

The attributes listed here are not exhaustive but provide a basis from which to plan your learning and have been identified in relation to learning opportunities relevant to this area of specialty and in relation to published practice guidelines (e.g. Broomhead 2012, 2006).

Take a few minutes at the very **start** of your placement/ rotation to consider the list of attributes (with reference to ‘knowledge’ and ‘skills’) and, using the scale, judge your current levels in the areas.

You need to **revisit** this tool by completing a new form at an agreed time; e.g. **in preparation for halfway assessment/supervision**, and **at the end of your rotation/ placement**, or more frequently as appropriate. Following completion, compare forms – changes will indicate where learning has occurred and where further learning needs are required; this can guide your supervision and future learning objectives.



Amputee Rehabilitation

At this point in time rate your **knowledge** and understanding of:

	weak					strong				
	1	2	3	4	5	6	7	8	9	10
1. The causes of amputation	1	2	3	4	5	6	7	8	9	10
2. The principles of amputation e.g. investigations, levels, complications	1	2	3	4	5	6	7	8	9	10
3. The psycho-social aspects of amputation	1	2	3	4	5	6	7	8	9	10
4. The pre-operative management of the lower limb amputee e.g. assessment	1	2	3	4	5	6	7	8	9	10
5. The early post-operative management of the lower limb amputee e.g. assessment, oedema control, wound healing, prevention of infection, exercise therapy	1	2	3	4	5	6	7	8	9	10
6. Causes of pain, residual limb and phantom	1	2	3	4	5	6	7	8	9	10
7. The referral procedure to the limb fitting centre/DSC	1	2	3	4	5	6	7	8	9	10
8. The pre-prosthetic rehabilitation stage e.g. early walking aids, prosthetic prescription	1	2	3	4	5	6	7	8	9	10
9. The prosthetic rehabilitation of the lower limb amputee e.g. prostheses, gait analysis	1	2	3	4	5	6	7	8	9	10
10. The role (within the overall management of the amputee) of the										
Surgeon	1	2	3	4	5	6	7	8	9	10
Rehabilitation Consultant	1	2	3	4	5	6	7	8	9	10
Nurse	1	2	3	4	5	6	7	8	9	10
Physiotherapist	1	2	3	4	5	6	7	8	9	10
Prosthetist	1	2	3	4	5	6	7	8	9	10
Clinical Psychologist	1	2	3	4	5	6	7	8	9	10
Occupational Therapist	1	2	3	4	5	6	7	8	9	10
Social Worker	1	2	3	4	5	6	7	8	9	10
Dietician	1	2	3	4	5	6	7	8	9	10
11. Post-discharge management e.g. onward referral, review	1	2	3	4	5	6	7	8	9	10
12. Outcome measures (in relation to amputee rehabilitation)	1	2	3	4	5	6	7	8	9	10

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At this point in time rate your **skills** and ability with:

	weak					strong				
1. Examination and assessment of patients:										
pre-operatively	1	2	3	4	5	6	7	8	9	10
post-operatively	1	2	3	4	5	6	7	8	9	10
pre-prosthetically	1	2	3	4	5	6	7	8	9	10
prosthetically	1	2	3	4	5	6	7	8	9	10
2. Setting appropriate and realistic goals of treatment	1	2	3	4	5	6	7	8	9	10
3. Recognising the indications for oedema control	1	2	3	4	5	6	7	8	9	10
4. Recognising the indications for early walking aids	1	2	3	4	5	6	7	8	9	10
5. Recognising complications	1	2	3	4	5	6	7	8	9	10
6. Evaluating and progressing patients	1	2	3	4	5	6	7	8	9	10
7. Equipment handling:										
Wheelchairs	1	2	3	4	5	6	7	8	9	10
Early walking aids e.g. ppam aid	1	2	3	4	5	6	7	8	9	10
Walking aids e.g. sticks	1	2	3	4	5	6	7	8	9	10
8. Patient handling:										
Transfers	1	2	3	4	5	6	7	8	9	10
Treatment	1	2	3	4	5	6	7	8	9	10
9. Pain and its management	1	2	3	4	5	6	7	8	9	10
10. Falls advice and strategies	1	2	3	4	5	6	7	8	9	10
11. Psychological support to patients and carers	1	2	3	4	5	6	7	8	9	10
12. Problem-solving e.g. challenging and complex patients	1	2	3	4	5	6	7	8	9	10
13. Gait analysis	1	2	3	4	5	6	7	8	9	10
14. Advanced prosthetic rehabilitation e.g. 'free' knee componentry, running	1	2	3	4	5	6	7	8	9	10
15. Management of the bilateral lower limb amputee	1	2	3	4	5	6	7	8	9	10
16. Management of the non-prosthetic amputee	1	2	3	4	5	6	7	8	9	10
17. Management of the upper limb amputee	1	2	3	4	5	6	7	8	9	10
18. Effective communication with other members of the MDT	1	2	3	4	5	6	7	8	9	10
19. Discharge procedure	1	2	3	4	5	6	7	8	9	10
20. Information-giving to patients/clients and carers regards the rehabilitation process	1	2	3	4	5	6	7	8	9	10
21. Evaluating and developing the service for this patient/client group	1	2	3	4	5	6	7	8	9	10

Are there any other areas, related to the management of the amputee, in terms of knowledge, skills and ability, that you feel have the potential for change and improvement? Please state and rate accordingly

1 2 3 4 5 6 7 8 9 10

1 2 3 4 5 6 7 8 9 10

1 2 3 4 5 6 7 8 9 10

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APPENDIX THREE

Clinical Centres

Details of contact names are correct at the time of amendment, December 2012. The centres listed do not reflect all 44 in the UK but those BACPAR believes practice placements may be provided.

Clinical Supervisor/ Lead Physiotherapist	Address	Contact details
Patricia Humphreys	Physiotherapy Dept RDS Musgrave Park Hospital Stockman's Lane Belfast BT9 7JB	02890902702 patricia.humphreys@belfasttrust.hscni.net
Gail Croston	Clinical specialist in Amputee Rehabilitation Physiotherapy department Blackpool Victoria Hospital Whinney Heys Rd Blackpool FY3 8NR	01253 300000 bleep 898 Fax: 01253 306720 email: gail.croston@bfwhospitals.nhs.uk
Nicola Snowdon/ Claire Jeffreys	Sussex Rehabilitation Centre (Brighton) Sussex Community NHS Trust Brighton General Hospital Elm Grove Brighton BN2 3EW	01273 696011 ext 3807 claire.jeffreys@nhs.net nicolasnowdon@nhs.net
Lysa Downing	Addenbrooke's	01223 217856 (answerphone)



Clinical Supervisor/ Lead Physiotherapist	Address	Contact details
	Rehabilitation Clinic Box 120, Addenbrookes Hospital Cambridge University Hospitals NHS Foundation Trust Hills Road Cambridge CB2 0QQ	01223 245151 bleep 156-2119 lysa.downing@addenbrookes.nhs.uk
Jo Burton	Physiotherapy Department Artificial Limb & Appliance Centre Rookwood Hospital Fairwater Road Llandaff Cardiff CF5 2YN	029 20313921 Fax 029 20567094 jo.burton@wales.nhs.uk
Catriona Mawdsley	Astley Ainslie Hospital 133 Grange Loan Edinburgh EH178SS	0131 5379166 Catriona.Mawdsley@nhslothian.scot.nhs.uk
Karen Clark	Amputee Rehabilitation Centre Derby Hospitals NHS Foundation Trust Derbyshire Royal Infirmary London Road Derby DE1 2QY	01332 254637 Fax - 01332 254639 karen.clark4@nhs.net



Clinical Supervisor/ Lead Physiotherapist	Address	Contact details
Louise Whitehead	Amputee Therapy East Block Ninewells Hospital Dundee DD1 9SY	01382 660111 lwhitehead@nhs.net
Anne Berry/ Eleanor Bacon	Physiotherapy Department Harold Wood DSC Harold Wood Hospital Gubbins Lane Romford Essex RM3 0AR	0170896217/97796236x01708 796201 anne.berry4@nhs.net eleanor.bacon@nhs.uk
Helen Scott /Ian Dawson	Westmarc Therapy Gym, Southern General Hospital South Glasgow University Hospital NHS Trust Govan Road Glasgow G51 4TF	0141 201 2636/2639 Fax 0141 201 2649 helen.scott@ggc.scot.nhs.uk ian.dawsoc@ggc.scot.nhs.uk
Julia Earle	Medway Maritime Hospital Windmill Road Gillingham Kent ME7 5NY	01634 833926 Julia.earle@nhs.net
Barbara Brown	Amputee Therapy Ward 2 Castle Hill Hospital Cottingham East Yorkshire HU16 5JQ	Barbara.Brown@hey.nhs.uk
Caroline Robertson	Prosthetics Department St. Mary's Hospital Newport Isle of Wight PO30 5TG	01983 822099 x5616 caroline.robertson@iow.nhs.uk



Clinical Supervisor/ Lead Physiotherapist	Address	Contact details
Lynn Hirst	Prosthetics Physiotherapy Department Seacroft Hospital York Road Leeds LS10	0113 203 3638 Lynnhirst@leedsth.nhs.uk
Anne Blundell/ Julie McAteer	Prosthetic and Wheelchair Centre University Hospital Aintree Lower Lane Liverpool L9 7AL	0151 529 8761/8762 anne.blundell@aintree.nhs.uk julie.mcateer@aintree.nhs.uk
Kate Lancaster/ Sara Smith/ Maggie Uden	Rehabilitation Gymnasium Douglas Bader Centre, Queen Mary's Hospital Roehampton Lane London SW15 5PN	020 8487 6042 Fax 020 8487 6907 sarah.smith2@stgeorges.nhs.uk
Amy Jones/ Nichola Carrington/ Jodie Georgiou	Prosthetic Physiotherapy Department GSTT Community Services, Bowley Close Rehabilitation Centre, Bowley Close Farquhar Road London SE19 1SZ	0203 0497724 Amy.jones@southwarkpct.nhs.uk Nichola.carrington@southwarkpct.nhs.uk jodie.georgiou@southwarkpct.nhs.uk



Clinical Supervisor/ Lead Physiotherapist	Address	Contact details
Sarah Bradbury	Vascular & General Rehabilitation Team Platt Rehabilitation Unit II, Manchester Royal Infirmary Oxford Road Manchester M13 9WL	0161 276 3642/3605 Fax 0161 276 3552 Sarah.Bradbury@cmmc.nhs.uk
Emma Rogerson	Disablement Services Centre Freeman Hospital Freeman Road Newcastle upon Tyne NE7 7AF	0191 2231184 ext 26909 emma.rogerson@nuth.nhs.uk
Ashwini Walvekar	Artificial Limb Centre Northampton General Hospital NHS Trust Cliftonville Northampton NN1 5BD	01604 545891 Ashwini.Walvekar@NGH.NHS.UK
Lucy Holt	Physiotherapy Department Prosthetic Service Nuffield Orthopaedic Centre Windmill Road Headington Oxford OX3 7LD	01865 227272 Fax 01865 227463 Lucy.holt@ouh.nhs.uk
Jess Slater	Physiotherapy Department Peterborough District Hospital Thorpe Road Peterborough PE3 6DA	01733 874688 Fax 01733 874683 Jessica.Slater@pbh-tr.nhs.uk



Clinical Supervisor/ Lead Physiotherapist	Address	Contact details
Jean Sugden	Physiotherapy Plymouth Disablement Services Centre 1 Brest Way, Derriford Plymouth PL6 5XW	01752 792777 Fax 01752 769076 jean.sugden@pcs-tr.swest.nhs.uk
Christine Willingale and Jayne Watkin	Specialist Mobility & Rehabilitation Centre Watling Street Road Fulwood Preston Lancs PR2 8DY	Christine.wilingale@lthtr.mhs.uk Jayne.watkin@lthrt.nhs.uk
Helen Jones	Rehab Physiotherapy / Limb Fitting Clinic Camborne/Redruth Community Hospital Barncoose Terrace Redruth Cornwall TR14 3ER	01209 881647 (Therapy Dep/ Admin) 01209 881986 (Therapy Dep Fax) Helen.Jones@CIOSPCT.cornwall.nhs.uk
Jennifer Fulton	Royal National Orthopaedic Hospital Stanmore Brockley Hill, Stanmore , Middlesex, HA7 4LP	020 8909 5130 Jennifer.fulton@rnoh.nhs.uk



Clinical Supervisor/ Lead Physiotherapist	Address	Contact details
Ruth Woodruff	Physiotherapy Department North Midlands Limb Fitting Centre, Haywood Hospital High Lane Burslem Stoke-on-Trent Staffs ST6 7AG	01782 673615 Fax 01782 556120 ruth.woodruff@uhns.nhs.uk
Deborah Paterson/ Caroline Cater	Physiotherapy Department Wirral Limb Centre Clatterbridge Hospital Bebington Wirral CH63 4JY	0151 482 7812 Fax 0151 482 7813 deborahpaterson@nhs.net carolinecater@nhs.net
Louise Tisdale	Physiotherapy Department Maltings Mobility Centre The Maltings Herbert Street Wolverhampton WV1 1NQ	01902 444041 x 4721 Fax 01902 444038 Louise.Tisdale@nhs.net
Jennifer Jones	Rheolwraig Prosthetic / Prosthetic Manager Canolfan Cyfarpar ac Aelodau Artiffisial / Artificial Limb and Appliance Centre Ffordd Croesnewydd / Croesnewydd Road Wreccsam / Wrexham LL13 7NT	01978 727476 JENNIFER.JONES@wales.nhs.uk

