

Assistive Technology Provided by VA

A Model for Policy & Practice



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Objectives

Participants will understand . . .

1. The structure of VHA, Prosthetics & Sensory Aids Service and client eligibility for AT.
2. Three aspects of VHA policy and recommended practice surrounding provision of AT to veterans.
3. Three areas of unique and innovative AT applications coordinated for VHA beneficiaries.



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Veterans Health Administration

- ◆ Largest integrated healthcare system in US
 - 155 hospitals
 - 130 nursing homes
 - 45 domiciliaries
 - Nationwide out-patient clinics & programs
- ◆ More than 1400 sites of care
- ◆ More than 6 million veterans served in 2007



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VHA

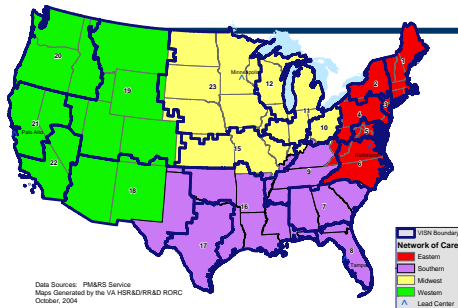
Geographic Organization

- ◆ 23 VISNs (regional networks)
- ◆ 23 regional SCI Centers
- ◆ Extensive PM&R program
- ◆ Blind Rehabilitation Centers
- ◆ 4 Polytrauma Rehabilitation Centers (PRC)
 - Minneapolis, Palo Alto, Richmond, Tampa
 - 22 Polytrauma Network Sites



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TBI Lead Center Geographic Coverage Area



Data Source: PM&RS Service
Map Generated by the VA HSR&D/RR&D RORC
October, 2004



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VHA Health Care Services

- ◆ Veterans of the armed forces
 - Army, Navy, Air Force, Marine Corps, Coast Guard
 - Commissioned officers of Public Health Service, Environmental Sciences Service Administration or National Oceanic & Atmospheric Administration
- ◆ Honorable Discharge
- ◆ Active duty military personnel
 - Services
 - Equipment



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Qualifications for VA Healthcare

www.va.gov/healtheligibility

- ♦ **Service Connected (SC)**
 - Injured in the line of duty
 - Illness or disease linked to military service
- ♦ **Non Service Connected (NSC)**
 - Injury or illness after discharge from service
 - Many VA patients are NSC



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VA Comprehensive Services

- ♦ Primary Care
- ♦ Medical & Surgical
- ♦ Spinal Cord Injury
 - Intensive Care
 - Acute Rehabilitation
 - Out-patient
 - Lifetime services
- ♦ Rehabilitation
 - PM&R
 - Blind Rehabilitation
 - Speech & Audiology
 - Recreation Therapy
 - POLYTRAUMA program
- ♦ Mental Health
- ♦ Geriatrics
- ♦ Extended Care
- ♦ Out-patient care



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VA Comprehensive Services

- ♦ **Adaptive Equipment**
 - All veteran issued equipment and technologies coordinated, provided and managed by . . .



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Prosthetics and Sensory Aids Service

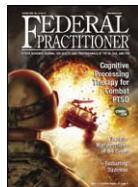


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War Impacts Change

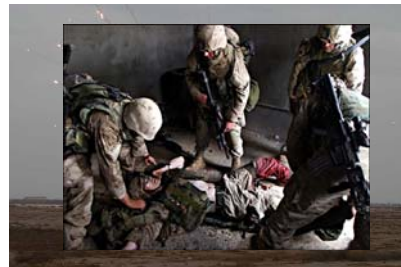
Advances & Challenges

- ♦ Survival of combat injured
- ♦ Technology Innovation
- ♦ Clinical Applications of Technology & Treatment Approaches



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OEF/OIF: Blast Injuries



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TBI “signature injury” of OEF/OIF

“The typical patient, Dr. Scott said, has head injuries, vision and hearing loss, nerve damage, multiple bone fractures, unhealed body wounds, infections and emotional or behavioral problems. Some have severed limbs or spinal cords.”



From The New York Times, Jan 31, 2006

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OEF/OEF Blast Injuries

- ◆ Technology Advances
 - Prosthetic Limbs
 - Electronic Technologies
 - Wheeled Mobility
 - Sports & Recreation
 - Universal Design




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A New Generation of Veterans



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Many Generations to Support



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Introduction to PSAS

PSAS includes the total process associated with replacing, supporting, and/or complementing human anatomy and/or function impaired or destroyed as a result of trauma or disease.

Provide technologies necessary due to loss or permanent loss of use of body part or function.

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PCLO Web Sites

Prosthetics & Clinical Logistics Office

- ◆ VA INTRANET
vawww.pclo.med.va.gov
- ◆ INTERNET
www.prosthetics.va.gov

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“Prosthetics” is artificial limbs . . .



Power Knee by Ossur

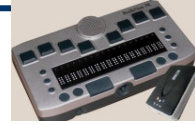


I-hand by Touch Bionics



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. . . And everything else



Talking GPS



Comtek AT 216



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Comprehensive AT Interventions



- ♦ Wheeled Mobility
- ♦ Custom Seating
- ♦ Vehicle Modification
- ♦ Home Modification
- ♦ Computer Access
- ♦ Environmental Control
- ♦ Lift system
- ♦ Self care equipment
- ♦ Home Telehealth



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Prosthetics & Clinical Logistics Office (PCLO)

National Office in Washington, DC

- Chief Officer Prosthetics and Clinical Logistics
- Deputy Chief Officer for PSAS
- Prosthetics Clinical Coordinator
- Program Managers
- Program Analysts
- VISN Prosthetics Representatives (23)
- Prosthetics Chiefs



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Populations Served by PSAS

Veterans with needs related to . . .

- ♦ Amputation
- ♦ SCI/D
- ♦ Visual Impairment
- ♦ Podiatric Care
- ♦ Cardio-Pulmonary Dz
- ♦ Traumatic Brain Injury
- ♦ Neurological Dysfunction
- ♦ Muscular Dysfunction
- ♦ Orthopedic Care
- ♦ Diabetes/Metabolic DZ
- ♦ Peripheral Vascular DZ
- ♦ Cerebral Vascular DZ
- ♦ Geriatric Impairments
- ♦ POLYTRAUMA



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OEF/OIF and PSAS Uniques

COUNT OF OEF/OIF and PSAS UNIQUE PATIENTS BY FISCAL YEAR					
ALL OEF/OIF to ALL PSAS	FY 2003	FY 2004	FY 2005	FY 2006	FY 2007
Total OIF/OEF Veterans served by PSAS (all items)	1,437	3,928	4,341	22,910	34,491
Total All PSAS Patients (all items)	1,230,937	1,383,658	1,462,787	1,519,150	1,606,851
% of OIF/OEF to All PSAS Patients	0.12%	0.28%	0.30%	1.51%	2.15%
Total PSAS Expenditures for OIF/OEF	\$478,568	\$2,011,830	\$2,730,873	\$8,576,538	\$14,643,790
Total PSAS Expenditures	\$803,965,369	\$957,957,853	\$1,032,059,435	\$1,105,566,981	\$1,153,717,230
% of OIF/OEF Expenditures to All PSAS Expenditures	0.06%	0.21%	0.26%	0.78%	1.27%



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OEF/OIF and PSAS Amputees

ALL OEF/OIF AMPUTEES to ALL PSAS AMPUTEES	FY 2003	FY 2004	FY 2005	FY 2006	FY 2007
OEF/OIF Amputees with Major Amputation <small>(Includes provision of a new limb or a repair to an existing limb in the AK, BK, and UE categories; patients that fall into multiple categories are only counted once.)</small>	4	20	30	138	211
All Unique Amputees served by PSAS <small>(Includes provision of a new limb or a repair to an existing limb in the AK, BK, and UE categories; patients that fall into multiple categories are counted more than once.)</small>	9,764	8,986	7,142	10,772	11,823
PSAS Costs for OEF/OIF Amputees with Major Amputation	\$28,562	\$194,725	\$487,440	\$1,952,466	\$3,917,401
PSAS Costs for All Amputees	\$43,834,954	\$45,251,149	\$42,334,482	\$56,143,487	\$61,472,887
% of Costs for OEF/OIF Amputees to Cost for All PSAS Amputees	0.07%	0.43%	1.15%	3.48%	4.91%



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VHA Coverage Policy

VHA Handbook 1173

- Establishes uniform and consistent national policy and procedures for the provision of prosthetic services.
- 17 chapter document designed to address the process for serving the core of VA's disabled veterans



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VHA Handbook 1173

- 1173.1-Eligibility for Prosthetics Services
- 1173.2-Provision PSAS
- 1173.3-Amputee Care
- 1173.4-Automobile Adaptive Equipment
- 1173.5-Blind Rehab
- 1173.6-Wheelchairs
- 1173.7-Audiology and Speech
- 1173.8-Medical Equipment & Supplies



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VHA Handbook 1173 cont. .

- 1173.9-Footwear
- 1173.10-Orthotic Support
- 1173.11-Ocular Prostheses/Restorations
- 1173.12-RX Optics and Low Vision
- 1173.13-Home O2
- 1173.14-HISA
- 1173.15-Clothing Allowance
- 1173.16-Driver Rehabilitation
- 1173.17-Home Telehealth



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Chapter Table of Contents

1173.08 Medical Equipment & Supplies

- Beds
- Lifts
- Stair glides
- Porch lifts
- Ramps
- Air conditioners
- ECUs
- Telehealth devices
- Seat lift devices
- Mobility/walking aids
- Rehab/Recreational Equipment
- Other items



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Supporting Documentation

Clinical Practice Recommendations Prosthetics Clinical Management Program



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Prosthetic Clinical Management Program

Integrated Product Teams (IPT)

- Healthcare Professionals (Chair is Clinician)
- Central Office Representatives
- VISN Prosthetic Representatives
- Local Prosthetics Staff
- NAC Contract Specialist(s)
- Patient Safety Representative
- General Counsel (NAC)
- Veteran Service Officer



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PCMP Goals for IPTs

- Develop specifications of Prosthetic appliances that meet the needs of the majority of patients
- Promote the development of uniform Prosthetic Clinical Practice Recommendations (CPRs)
- Support outcome measurements and research
- Enhance and standardize quality of care
- Reduce the acquisition cost of Prosthetic appliances



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Active PCMP IPTs

- | | |
|----------------------------|--|
| 1. Blood Pressure Monitors | 18. Home Oxygen |
| 2. TENS | 19. Scooters |
| 3. VED | 20. Aids for the Blind |
| 4. CCTV | 21. Orthotic Soft Goods |
| 5. Diabetic Socks | 22. Assistive Listening & Alerting Devices |
| 6. BIPAP/CPAP | 23. Speech Devices |
| 7. Pacemakers/ICDs | 24. Optical Aids for the Blind |
| 8. Intra Ocular Lenses | 25. Dental Implants |
| 9. Deep Brain Stimulator | 26. Footwear |
| 10. Ortho Hips and Knees | 27. Left Ventricular Assist Device |
| 11. Wheeled Mobility | 28. Lift Chairs |
| 12. Cochlear Implants | 29. Artificial Limbs |
| 13. Coronary Stents | 30. Home Health Telemonitoring |
| 14. Computers & Software | 31. Scooter Lifts |
| 15. Eyeglasses | 32. Ramps |
| 16. Walkers | 33. Biological Implants |
| 17. Hospital Beds | |



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Clinical Practice Recommendations

- ◆ Available on Internet and VA Intranet
 - www.prosthetics.va.gov/cprs
- ◆ 39 CPRs currently published
 - More in progress
- ◆ Many apply directly to Assistive Technologies



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Clinical Practice Recommendations

- ◆ Hearing Impairment (6)
- ◆ Visual Impairment (5)
- ◆ Mobility (13)
- ◆ Computer Access (3)
- ◆ Speech/Cognition (4)
- ◆ Home Telehealth
- ◆ Sports & Recreation Equipment



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Supporting Documentation

Example

- ◆ 1173.7 Audiology & Speech Devices
 - Clinical Practice Recommendations
 - Alerting Devices for Hearing Impaired
 - Assistive Listening Devices
 - Audible Prescription Reading Devices
 - Cochlear Implants
 - FM Systems & Personal Amplifiers
 - AAC Systems
 - Cognitive Prosthetic Devices
 - Tracheostomy Speaking Valves
 - Voice Prostheses



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CPR Cognitive Prosthetic Devices

CPD is any electronic based product or system whether acquired as a retail item, modified retail item, or customized one, that is used by an individual to compensate for cognitive-communication impairments that affect his/her ability to participate in activities of daily living (ADLs) and higher level ADLs (IADLs) including work.



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Cognitive Prosthetic Devices



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Handheld Computers



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Handheld Global Positioning Systems



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CPR Cognitive Prosthetic Devices

Prior to receiving a CPD . . .

- Formal clinical evaluation
- Reasonable & necessary device
- Measurable functional goals
- Client can operate device & will use it
- Planned follow up
 - Outcome Measurement



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Wheeled Mobility IPT



- ♦ Scooters
- ♦ Power wheelchairs
- ♦ PAPAWs
- ♦ Manual wheelchairs
- ♦ "Other" devices



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Wheeled Mobility

- ♦ VHA Handbook 1173.6
 - Eligibility, procedures, guidelines
 - Power wheelchairs
 - Manual wheelchairs
 - Scooters
 - Sports Wheelchairs
- ♦ Clinical Practice Recommendations (CPRs)



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Wheeled Mobility CPRs

- ♦ Motorized Wheeled Mobility Devices: Scooters, Pushrim-Activated Power-Assist Wheelchairs, Power Wheelchairs and Power Wheelchairs with Enhanced Function”
 - iBOT Addendum
 - iBOT Directive pending
- ♦ Manual Wheelchairs
 - Standard manual wheelchairs
 - Rehab manual wheelchairs
 - All other technologies



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Manual Wheelchair CPR Definitions

- ♦ Standard mwc
- ♦ **Rehab mwc**
- ♦ Ultralightweight mwc
- ♦ Heavy Duty
- ♦ Extra Heavy Duty
- ♦ Transport wheelchair
- ♦ Tilt-in-space
- ♦ Recline function
- ♦ Tilt/recline combo
- ♦ Standing function



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Rehab MWC ~ National Contract

- ♦ Quick release wheels
- ♦ Back angle adjustment
- ♦ Back height adjustment
- ♦ Camber
- ♦ Wheel position adjustable
 - Horizontal
 - Vertical
- * Optimal rear wheel alignment needed



Invacare
Patriot Plus



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Seating Intervention Polytrauma with Amputation



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PSAS Support for Clinical Projects

- ♦ Program Evaluation System (Quality Improvement)

“The SmartWheel: Clinical Utility for Manual Wheelchair Propulsion Education”.



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SmartWheel Data Display



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Specialized Equipment

- ♦ 10-2641 "Authority for Issuance of Special and/or Experimental Appliances"
- ♦ Provide documentation (1173.02)
 - Client background/reason equipment needed
 - Home visit if applies
 - Alternatives considered or trialed
 - Ability of patient to use effectively
 - Training provided
 - Literature & scientific documentation

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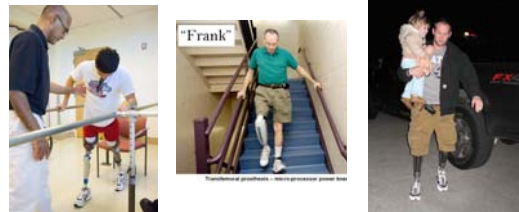
Adaptive Sports & Recreation



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Prosthetic Limbs

- 61 Accredited P&O Laboratories



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State of the Art Technologies



DEKA ARM



i-Hand by Touch Bionics

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VA National Contracting

- ♦ NOT the same as CMS Competitive Bidding
- ♦ Commodity equipment & supplies
- ♦ Complex Rehab NOT included
- ♦ Technical Evaluation completed by IPT
- ♦ Standardization
 - To a HIGHER standard
 - Not restrictive



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National Prosthetics Patient Database (NPPD)



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VA NPPD

- ♦ Comprehensive equipment tracking
- ♦ All devices & supplies for unique veterans
- ♦ Allows local, regional, national tracking
 - Individual
 - Products
 - Compliance with contracts
 - Cost Trends
 - Research



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FY2007 ~ NPPD

Wheelchairs & accessories	\$122,731,096	(86,945)
Artificial Legs	45,916,514	(8,058)
Artificial Arms	2,527,059	(380)
Orthoses/Orthotics	33,590,207	(678,401)
Hearing Aids	122,000,000	(348,920)



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FY2007 ~ NPPD

Restorations	35,000,000	(769,522)
Medical Equipment & Supplies	137,891,613	(2,200,000)
HISA	5,582,601	
Surgical implants	354,630,421	(241,805)

**Total Purchases + Repairs = \$1.2 Billion
2007**



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Assistive Technology

Provided by VA

Moving PSAS forward . . .

- ♦ Clinician Education & Training
- ♦ RESNA AT Certification
- ♦ Outcome Measurement
- ♦ Consistency across the nation
- ♦ Further research & development
- ♦ Increased public awareness of VA programs, services & successes



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Thank You!

***Support Our
Troops!***

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