

CURRICULUM VITAE

Arthur J. Nitz, PhD, PT

I. General Information

HOME ADDRESS

132 Farmbrook Circle
Frankfort, KY 40601
(502) 695-5391

OFFICE ADDRESS

University of Kentucky
Physical Therapy Division
204 Charles T. Wethington, Jr. Bldg.
900 S. Limestone
Lexington, KY 40536-0200
(859) 323-1100, ext. 80833

BIRTH DATE: 7/21/53

LICENSURE: #606 1977 Kentucky

MILITARY: Reserve (Captain) U.S. Army; resigned 1991

MARITAL STATUS: Married

(Spouse)	Jane	
(Children)	Nathan	12/25/79
	Melinda	9/01/82
	Jonathan	12/11/87
	Jordan	4/25/90
	Kirsten	9/21/93

II. Education

<u>Year</u>	<u>Degree Major-Subspecialty</u>	<u>Institution</u>
1975	B.S. Biology	Wheaton College
1976	M.S. Physical Therapy	Baylor University
1984	Ph.D. Anatomy	University of Kentucky

Title of Dissertation: Functional and Structural Assessment of Rat Sciatic Nerve Following Pneumatic Tourniquet Compression and Vascular Manipulation

Continuing Education

April 1977 - 2nd Annual Dogwood Conference – Orthopedics and Sports Medicine
Atlanta, GA

July 1977 - Musculoskeletal Assessment (U.S. Army), San Antonio, TX

February 1978 – APTA EMGI – Orlando, FL

April 1978 – APTA EMG II – Pittsburgh, PA

May 1979 – Personnel Management (U.S. Army), San Antonio, TX

Oct. 5-8 1979 – 26th Annual Meeting – American Assoc. of Electromyography and
Electrodiagnosis, New Orleans, LA

April 1982 – 95th Annual Meeting-American Association of Anatomists, Indianapolis, IN

October	1983 – Southern Society of Anatomists, Annual Meeting, Morehead City, NC
April	1984 – 97 th Annual Convention – American Association of Anatomists, Seattle, WA
Oct. 14-15	1985 – Atlanta Back School: How to Start a Back School, Seattle, WA
Nov. 15-17	1986 – Lumbar Spine – Evaluation and Treatment, Portland, OR
February 7	1987 – Transcutaneous Electrical Nerve Stimulation, Louisville, KY
June 28 – July 2	1987 – APTA Annual Conference, San Antonio, TX
November	1987 – “Orthopedic Insult and Neurologic Injury” American Physical Therapy Group
February	1988 – “Muscle Strengthening with Electrotherapy for Clinicians”, Edgewood, KY
June 13-17	1988 – National APTA Conference, Las Vegas, NV
Feb. 2-5	1989 – Combined Sections Meeting APTA, Honolulu, HI
June 10	1989 – National APTA Conference, Nashville, TN
Feb. 1-4	1990 – Combined Sections Meeting APTA, New Orleans, LA
Feb. 1-4	1991 – Combined Sections Meeting APTA, Orlando, FL
Feb. 2-5	1993 – Combined Sections Meeting APTA, San Antonio, TX
June 14	1993 – National APTA Conference, Cincinnati, OH
Feb. 2-6	1994 – Combined Sections Meeting APTA, New Orleans, LA
May 14	1994 – Perspectives in Lumbar Spine Surgery, Lexington, KY
August 19	1994 – Clinical Research Update, Keesler Air Force Base, MS
Oct. 14-16	1994 – APTA Sports Section – MD/PT Meeting
May 25-26	1995 – SEATA Annual Meeting, Atlanta, GA
Sept. 8-10	1995 – Annual Fall ENMG Symposium, Old Dominion University, Norfolk, VA
June 16-21	1996 – Annual APTA National Conference, Minneapolis, MN
Feb.12-16	1997 – APTA Combined Sections Meeting, Dallas, TX Specialization Academy of Content Experts I
Aug. 15-17	Annual ENMG Symposium, Old Dominion University, Norfolk, VA
Nov. 15	1997 – Comprehensive Management of Adult Spinal Disorders, Ky Spine Institute, Lexington, KY

Feb. 12-15	1998 – APTA Combined Sections Meeting, Boston, MA
Feb. 3-7	1999 – APTA Combined Sections Meeting, Seattle, WA
Feb. 14-17	2001 – APTA Combined Sections Meeting, San Antonio, TX
April 6-8	2001 – Annual ENMG Symposium, Park City, UT
Mar. 15-16	2002 – KPTA 2002 Annual Conference, Thomas Moore College, Crestview Hills, KY
June 5-8	2002 – APTA Annual Conference, Cincinnati, OH
Feb. 13-16	2003 – APTA Combined Sections Meeting, Tampa, FL
February 5	2004 - APTA Combined Sections Meeting, Nashville, TN
May 14-15	2004 – 6 th Annual UK Sports Medicine Symposium
Feb 23-27	2005 – APTA Combined Sections Meeting, New Orleans, LA
April 1,2	2005 – 16 th Annual ENMG Symposium, Provo, UT
Oct. 15	2005 – KPTA Annual Fall Conference, Louisville, KY
February 1-5	2006 – APTA Combined Sections Meeting, San Diego, CA
April 28, 29	2006 – Functional Fitness and the Science of Joint Preservation Louisville, KY
February 14-18	2007 – APTA Combined Sections Meeting, Boston, MA
April 13-14	2007 – 18 th Annual ENMG Symposium, Provo, UT

III. Professional Experiences

1976 - 1980	Staff Physical Therapist	Ft. Knox Army Hospital
1980 – 1984	Graduate Student	University of KY Anatomy Dept.
1980-present	Physical Therapist	Frankfort Physical Therapy Clinic
1984 – 1990	Asst. Prof. of Physical Therapy	Univ. of KY Physical Therapy Division
1990 – 1999	Assoc. Prof. of Physical Therapy	Univ. of KY Physical Therapy Division
1999-present	Professor of Physical Therapy	Univ. of KY Physical Therapy Division

IV. Academic Appointments

Assistant Professor of Physical Therapy –
University of Kentucky 1984; Full-time

HPER Department Graduate Faculty,
Associate Member, November 11, 1985

Graduate Faculty – Physical Therapy Program
Full Member, October 2, 1990

Director of Graduate Studies-Division of Physical Therapy
University of Kentucky, 1993-Present

Adjunct Faculty; Associate Professor
Institute of Physical Therapy
St. Augustine, FL, 1996-Present

Adjunct Faculty; Associate Professor
Rocky Mountain University of Health Professions
Provo, Utah, 1999-Present

V. Hospital or Clinical Appointments

UK Medical Center
Department of Neurology
Neurosensory and Communicative Disorders Laboratory
(1984-August, 1987)

VI. Consulting Activity

Local:

Cardinal Hill Hospital – Comprehensive Pain Clinic – Upon Request
Lexington Physical Therapy Clinic – Upon Request
Central Baptist Hospital, Physical Therapy Clinic – Upon Request
General Electric, Frankfort, KY – Back Pain, Carpal Tunnel Syndrome
University of KY – Pain Clinic

National:

Expert witness for Physical Therapist involved in legal case receiving national attention in our field.

VII. Teaching Activity

Didactic

January 1978	PT 866 “Electromodalities” University of Ky Physical Therapy School
June 1980	PT 866 “Electromodalities” University of Ky Physical Therapy School
Fall Semesters ANA 511 1981, 1983	Gross Anatomy: University of Kentucky College of Medicine
Fall Semester	ANA 512 Histology: University of Kentucky College of Medicine
Summer 1983	ANA 662 Ultrastructural Anatomy: UK Graduate School
Spring Semester 1984	ANA 516

Neuroanatomy: University of Kentucky
College of Medicine

1984-Present

PT 807	Clinical Functional Anatomy (48 students)
PT 846	Medical and Physical Therapy Management of Orthopedic Problems (48 students)
PT 876	Electrotherapy and Electrodiagnosis (48 students)
PT 868	Research (8 students)
PT 650	Peripheral Joint Dysfunction (Graduate) (Director-Primary Contributor)
PT 651	Spinal Dysfunction (Graduate) (Course Director, sole instructor)
ANA 503	Independent Study (1-2 students/graduate)
PT 695	Independent Study (1-2 students/graduate)
PT 768	Direction of Master's Thesis (3 students directed, 91/92) (3 on committees 91/92)
HPR 769	Member of Doctoral Dissertation Committee (Susan Johnson, 1991 and J. Nyland, 1992)
HPR 781/ PT 770	Seminar: Topics in Physical Therapy (6 spg 90) (10-12 spg 91) (2 sp 92)
PT 864	Research Methodology (1990) (48 students)
HPR 720	Sports Medicine (19840-1990) 3 hour lecture (12 students)
Fall 1988	"Electromodalities: Physics and Clinical Applications" for PM & R physician resident staff
Fall 1989	PT 847 – Course director (adult Neuro Rehab)
Fall 1991	PT 826 – Prosthetics Course Coordinator
Fall 1992	PT 847 – Adult Neuro Rehab – Lecturer PT 866-501 (Hazard) Course director and lecturer
Spring 1993	PT 805 – Normal Functional Anatomy – Lecturer
Spring 1993	PT 877 - Cardio-Respiratory Therapy – Course Coordinator
Spring 1994	PT 770 – Arthrology – Dissection Course – (Graduate 16 students)
Spring 1994	PT 695 – EMG – NCS (Graduate 1-4 students) PT 876 – Electrophysiological testing (undergraduate 47 students) PT 805 – Normal Functional Anatomy (undergraduate 49 students) – Lecturer
Fall 1994	PT 770 – Electrophysiologic Assessment (EMG/NCS)
Fall 1996-present	PT 676 – Electrophysiologic Assessment and Electrotherapeutics
Fall 1996-present	PT 686 – Specialty Electives
March 18, 1999	EMG/NCS Overview
April 27, 2000	Mt. St. Joseph College, Cincinnati, OH
March 30, 2001	
April 2, 2002	
July 23-24, 1999	EMG/NCS – Advance Techniques Rocky Mountain University of Physical Therapy, Provo, UT
August 4-5, 2000	EMG/NCS – Advanced Techniques Rocky Mountain University of Physical Therapy, Provo, UT
January 24-30, 2005	Electroneuromyography Basic Course (Part I) Rocky Mountain University of Health Professions Lexington, KY (UK)
May 16-22, 2005	Electroneuromyography Basic Course (Part II)

Rocky Mountain University of Health Professions
Lexington, KY (UK)

March 5-11, 2007 ENMG Basic Course (Part I) – Lexington, KY
July 16-22, 2007 ENMG Basic Course (Part II) – Lexington, KY

Summer 2007 PT 906 – Advanced PT Diagnosis and Screening (t-DPT)

Clinical

1977 – 1980 University of Kentucky, Physical Therapy Division – Clinical
Coordinator at Fort Knox Army Hospital

1977 – 1980 U.S. Army – Clinical Coordinator for Physical Therapy Assistant Program
at Fort Knox Army Hospital

Continuing Education – Courses – Primary Faculty

Title: “Musculoskeletal Assessment”
Location: South Williamson, KY
Date: November 11, 1984
Sponsor: University of Kentucky, College of Allied Health Professions, Office of
Continuing Education and Appalachian Regional Hospitals

Title: “Neuroanatomy Review”
Location: Wheaton College, Illinois
Date: February 15, 1985
Sponsor: Wheaton College Graduate School, Department of Psychology

Title: “The Shoulder Joint: Assessment and Treatment Techniques”
Location: Cumberland Falls State Resort Park
Date: October 26, 1985
Sponsor: University of Kentucky, College of Allied Health Professions, Office of
Continuing Education and Appalachian Regional Hospitals

Title: EMG Advanced Course
Location: Ft. Lauderdale, FL
Date: December 6, 7, 8, 1985
Sponsor: National APTA Section on Clinical Electrophysiology

Title: “Evaluation and Orthopedic Manual Therapy of the Hip and SI joint”
Location: Kingsport, TN
Date: November 1, 1986
Sponsor: University of Kentucky, College of Allied Health Professions, Office of
Continuing Education and Appalachian Regional Hospitals

Title: “The Hip and SI Joints: Assessment and Treatment Techniques”
Location: Owensboro, KY
Date: November 8, 1986
Sponsor: Western Kentucky Chapter APTA

Title: “Orthopedic Insult and Neurologic Injury”
Location: Lexington, KY

Date: November 14, 1987
 Sponsor: American Physical Therapy Group, Continuing Education

Title: "Muscle Strengthening with Electrotherapy for Clinicians"
 Location: Edgewood, KY
 Date: February 27, 1988
 Sponsor: KAMED, Inc.

Title: "Peripheral Joint Mobilization – Review and Practical Applications"
 Location: Louisville, KY
 Date: August 20, 1988
 Sponsor: Central Kentucky APTA

Title: "Sharpening Your Skills in Upper Extremity Mobilization"
 Location: Lexington, KY
 Date: December 3, 1988
 Sponsor: American Physical Therapy Group

Title: "Current Trends in Electrotherapy"
 Location: Columbus, OH
 Date: February 25, 1989
 Sponsor: OSU - Physical Therapy Department

Title: "Electrotherapy - Overview"
 Location: Columbus, OH
 Date: April 8, 1989
 Sponsor: Ohio Chapter – APTA – Annual State Conference

Title: "Advances in Electrical Stimulation Treatment of Orthopedic Conditions"
 Location: Denver, CO
 Date: March 9-10, 1991
 Sponsor: Therex, Inc.

Title: "Perspectives in Lumbar Spine Surgery" Physical Therapy Treatment of LBP
 Location: Lexington, KY
 Date: May 14, 1994
 Sponsor: Kentucky Spine Institute

Title: "Current Topics in Physical Therapy: Research Update
 Location: Keesler Air Force Base, Mississippi
 Date: August 19, 1994
 Sponsor: U.S. Air Force, Physical Therapy Branch

Title: APTA Sportsmedicine Section MD-PT Meeting
 Location: Orlando, FL
 Date: October 14-16, 1994
 Sponsor: APTA Sportsmedicine Section

Title: MOTIVATOR 1994 User's Seminar: Research Update
 Location: Louisville, KY
 Date: October 22, 1994
 Sponsor: MOTIVATOR, Inc.

Title: Neurological Overview

Location: Atlanta, GA
 Date: March 25-26, 1995
 Sponsor: Southeastern Athletic Trainers Association

Title: Annual Fall ENMG Symposium
 Location: Old Dominion University, Norfolk, VA
 Date: September 8-10, 1995
 Sponsor: APTA Section on Clinical Electrophysiology of the APTA
 Title: Comprehensive Management of Adult Spinal Disorders
 Location: Lexington, KY
 Date: November 15, 1997
 Sponsor: Kentucky Spine Institute

Title: Back Pain: A Multi-disciplinary Overview of Etiology, Diagnosis, Therapy and Prevention
 Location: Lexington, KY
 Date: June 13, 1998
 Sponsor: UK College of Medicine, Dept. of Anatomy and Neurobiology and American Association of Clinical Anatomists

Title: 1st Annual University of Kentucky Wildcat Sports Medicine Symposium
 Location: Lexington, KY
 Date: May 14-15, 1999
 Sponsor: UK Sports Medicine

Title: Annual ENMG Symposium – Neurogenic Inflammation Update (Keynote address)
 Location: Park City, UT
 Date: April 7, 2001

Title: 6th Annual UK Sports Medicine Symposium
 “Pearls of Knee/Ankle Rehabilitation: What is Important?”
 Location: Lexington, KY
 Date: May 14-15, 2004

Title: 1st Annual Kettering Sports Medicine Conference
 “ACL Rehabilitation: Update”
 Location: Dayton, OH
 Date: April 22, 2005

Title: “An Evidence-based Course on Differential Diagnosis of Complex Shoulder Disorders”
 Location: KPTA Fall Conference Louisville, KY
 Date: October 15, 2005

Title: “Complex Patient Presentation – Multi-section Symposium”
 Location: APTA, CSM – San Diego, CA
 Date: February 2, 2006

Title: “The Use of Ultrasound Imaging to Measure Select Trunk Muscle Activation During Induced Pain”
 Location: APTA, CSM – San Diego, CA
 Date: February 4, 2006

Title: "Clinical and Electrophysiologic Effects of Aging on Neurologic Function: Spinal Stenosis"
Location: APTA, CSM – Boston, MA
Date: February 17, 2007

Title: "Effects of Aging on Peripheral Neuromuscular System Function and Electrophysiologic Testing"
Location: Provo, UT
Date: April 13, 2007

VIII. Advising Activity

1984-Present Professional (Physical Therapy); 8 juniors / 8 seniors per academic year

1984-Present Graduate (Master's and Doctoral); 1-6 students per year

Theses and Dissertations:

May, 1985 C.L. Soo: Comparison of electrical stimulators for clinical performance

May, 1986 J.E. Tracy: Comparison of two different electrical stimulators and selected pulsed frequencies on blood flow in health subjects

December, 1987 Eileen Moore: "Influence of gravity on generation of hamstring torque" (Director)

June, 1988 James Rooney: "Effect of Variation in the Frequency and Carrier Frequency of High Intensity Electrical Stimulation on Muscle Fatigue And Pain Perception in Healthy Subjects"

April, 1989 Gary Wilkerson: "The Comparative effects of Standard and Modified Adhesive Taping Methods on Ankle Motion Before and After Exercise"

April, 1989 Rick Clemente: "Effects of 2500 Hz Transcutaneous Electrical Stimulation On the Degree of Microvascular Pertusion of Rat Skeletal Muscle"

April, 1990 Bob Kellogg: "Muscular strength gains and sensory perception changes: A comparison of magnetic and electrical stimulation" (Director)

June, 1990 Rob Cruver: "Comparison of three rehabilitation protocols following Arthroscopic meniscectomy" (Director)

June, 1990 Julie Keller: "A normative data study of isometric neck strength in college Age males"

June, 1990 Tim Noteboom: "Comparison of various electrical stimulation waveforms On torque production and comfort level"

June, 1990 Jim Vakos: "Electromyographic analysis of hip extensor musculature During a squat lift: Effect of varying lumbar posture" (Director)

David Boyce (MS) - Effect of Cyclic Passive Stretching of the Hamstring Muscles on Knee Flexion Range of Motion

Joe Haddad (MS) - The Effect of the McDavid M-202 Knee Guard on the Mechanics and

Kinematics of Running Gait

- David Tomsich (MS) - Patellofemoral Alignment: Validity, Reliability and Normal Values
- Robert Wainner (MS) - Muscular Strength Gains and Sensory Perception Changes; A Comparison Of Electrical and Combined Electrical/Magnetic Stimulation
- Paul Schwartz (MS) - Intratester and Intertester Reliability of the Back Range of Motion Device
- John Nyland, EdD, 1994 3-D Motion Analysis and EMG Assessment of the Crossover Cut Among Normal Women
- Jim Bellew (MS), 1995 Concentrics versus Eccentric Strength of the Quadriceps Femoris In Three Age Groups
- Robert C. Hall (MS), 1996 A Study of H-Reflexes in Subjects with Acute Ankle Inversion Sprains
- Margot Van Eck (MS), 1996 Neck Pain and Relationships among Cervical Range of Motion, Forward Head Posture and Functional Disability
- Joseph A. Brosky (MS), 1996 Intra-rater Reliability of Selected Clinical Outcome Measures Following Anterior Cruciate Ligament Reconstruction
- Rachel Neal (MS), 1997 The Effect of Age on Dorsiflexion Mobility Requirements for the Sit-to-Stand Sequence in Females
- Ruth Ann Geiger (MS), 1998 A Pilot Study: Effects of Dynamic Balance Training on Functional Measures Following Stroke
- Lee Cabell (EdD), 1999 Biodynamic Parameters Related to Gait between Young and Elderly Females
- Richard Walsh (DPT), 1999 Sensitivity to Valid Change in Low Back Pain Patients Using Three Modified Forms of the Related Morris Disability Questionnaire
- Charle R. Hazle (MS), 2000 The Effects of Manual Therapy on Postural Equilibrium Deficits Due to Whiplash Associated Disorder
- Tim Brindle (PhD), 2001 Shoulder Proprioception: Latent Muscle Reaction Times
- Robert Sellin (DSc), 2001 Electrophysiologic Assessment for Nerve Injury in the Horse
Rocky Mountain University of Health Professions
- Robert Schulte (DSc), 2001 Throwing Injury – Adolescent Athlete
Rocky Mountain University of Health Professions
- Nancy Quick (PhD), 2002 Neurotension/EMG-NCS Changes in a Rat Model
- Brian Wise (MS) 2003 Electromyographical Comparison of Open and Closed Chain Shoulder Exercises

Tim Carver (MS) 2003	Examination of Electromyographic Activity of shoulder Girdle Musculature While Progressively Increasing Glenohumeral Axial Compression
David Brajuha (MS) 2003	EMG Analysis for Four Muscles During Three Prescribed Core Stabilization Exercises
Nina Kuschinsky (MS) 2004	Muscle Activity Comparison of Four Common Shoulder Exercises in Stable and Unstable Shoulders
Richard Read (DSc) 2004	A Comparison of the Intra-Subject Differences in Bilateral Compound Muscle Action Potential Maximal Amplitudes for the Upper Trapezius Muscle Responses in Asymptomatic Subjects
Kevin Robinson (DSc) 2004	Effects of Exercise Induced Muscular Fatigue on the Kinetics and Electromyographic Activity of a Single-Leg Vertical Jump in Healthy Men Rocky Mountain University of Health Professions
Courtney Mulvihill (MS) 2004	Muscular Contributions of the Anterior and Posterior Tibialis, Gastrocnemius, and Fibularis Longus with and without Orthotics during Bilateral Stance
Jennifer LaFalace (MS) 2005	Comparison of Equilibrium Scores to Center of Pressure During Bilateral Stance
Jennifer Stiller (MS) 2005	The Effectiveness of a Shoulder Slide Protocol Versus a Traditional Rehabilitation Protocol Following Rotator Cuff Injury
Dustin Biggs (MS) 2005	Comparison of Navicular Drop to Arch Height Index Measures in Classifying the Foot
David Lord	DSc candidate – Rocky Mountain University of Health Prof.
Mark Brooks (DSc) 2005	Effect of Age & Limb Length on Median Nerve H-Reflex latency Recorded from the Flexor Carpi Radialis in Healthy Subjects Rocky Mountain University of Health Prof.
Lori Bolgla (PhD) 2005	Etiology of Patellofemoral Pain Syndrome: A Proximal Link to a Distal Problem
Kyle Kiesel (PhD) 2007	Ultrasound Imaging of the Lumbar Multifidus Muscle
Scott Shaffer (PhD) 2007	The Impact of Diabetes and Peripheral Neuropathy on Fall Risk and Function in Adults
Chuck Hazle	PhD Candidate – UK Rehabilitation Sciences

IX. Administrative Activity and University Service

1986-present	College of Health Sciences Student Advisory Committee Chairman
1984-85	Recruitment Committee, Chairman
1984-present	Admissions Committee, Member

1985-present	Scholarship Committee, Chairman
	Physical Therapy Patient Care Committee
7/01-12/90	Acting Director, Physical Therapy Division
3/91-present	CAHP, Faculty Review Appeals Committee
1/91-present	Search Committee (PT Division), Chairman
7/91-12/92	Acting Director, Physical Therapy Division
4/93-present	Director of Graduate Studies, Division of Physical Therapy
1995-present	Chair and committee member – Promotion and Tenure Committee (Intermittent assignment)
2003	Outside Reviewer for Doctoral Committee for Vanessa Venable (Clinical Psychology)
2004	Outside Reviewer for Doctoral Committee for Brian Lee Zeller (Kinesiology and Health Promotion)
2005	Dean’s Search Committee, College of Health Sciences (Appointed by Provost Mike Nietzel)
2006-2007	Chair, College of Health Sciences Promotion and Tenure Committee
2006-2007	Area Committee for Libraries and Archives, Promotion and Tenure

X. Special Assignment

2005 – 2009	Wheaton College – Appointed to Board of Visitors, a working subset of the Board of Trustees
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XI. Specialty Board

1989	Certified Specialist in Clinical Electrophysiologic Physical Therapy (ECS) by the American Board of Physical Therapy Specialties
1993	Certified Specialist in Clinical Orthopaedics Physical Therapy (OCS) by the American Board of Physical Therapy Specialties
1999	Re-certified in Clinical Electrophysiologic Physical Therapy (ECS) by the American Board of Physical Therapy Specialties
2003	Re-certified in Clinical Orthopaedic Physical Therapy

XII. Honors

1973-74	Wheaton College – Dean’s List (Grade Point Average 3.2 or above)
1974	Wheaton College, Football Co-Captain
1974	“Outstanding College Athletes of America” (JC’s)
1980	Army Commendation (medal)
1980	“Outstanding Young Men of America” (JC’s)
1980	Anatomy Department Fellowship Recipient
1988-1990	UK Medical Center Faculty Grant: (\$2500 each of 3 years - \$7500 total)

1993 Alpha Eta (Allied Health Honor Society-Kentucky Chapter)
 2001 U.S. Army-Baylor University Outstanding Alumni of the Year

XIII. Professional Activity and Public Service
Professional Organizations

National

1977-present APTA-member
 Sections – Clinical Electrophysiology and Orthopedics

State

1977-present Kentucky Chapter APTA member

Public Service

National

1984-present Subject matter expert (Journal) - Physical Therapy
 1986-present Manuscript Reviewer – Journal of Orthopedic and Sports Physical Therapy
 1984-present Invited book reviewer (Journal) - Physical Therapy
 1/21-24/1987 Critiqued/Reviewed paper for American Orthopedic Society for
 Sports Medicine; winter meeting – San Francisco, CA
 1984-present Editorial Board, Journal of Orthopedic and Sports Physical Therapy
 1987 Invited Prospective Book Reviewer, (Physiologic Basis of Orthopedic
 Therapy), W.B. Saunders
 10/22-23/1987 NIOSH NCV Manual Review – National Committee, Morgantown, WV
 1986-1990 APTA Orthopedic Section, Research Committee

State

1984-present Research Committee, Kentucky Chapter APTA
 9/10/1988 KY Chapter APTA Research Presentations and Annual Conference;
 Chairman of Concurrent Session
 1989-present Faculty sponsor, University of Kentucky Fellowship of Christian Athletes
 1995-present Governing Board Member, Capitol Area Christian Home Education Assoc.
 1997 Ad Hoc Committee Member, Kentucky Home Educators Assoc.
 1997 Governing Board Secretary, Family Foundation of Kentucky
 2001-present Governing Board Chairman, Family Foundation of Kentucky

XIV. Speaking Engagements

Local

10/1984 “Back Injury Prevention” – General Electric – Frankfort, KY
 5/22/1986 “Back Injury and Remedies” – St. Joseph Hospital – Lexington, KY
 4/28/1988 “Back Injury Prevention” – Frankfort Fire Dept. – Frankfort, KY
 11/9/1988 “Arthritis: Public Forum” – KY Chapter Arthritis Foundation – Frankfort, KY
 4/1993 “CTS Prevention” – Frankfort Area Labor Group – Frankfort, KY
 3/16/2006 “LBP and Aging – Getting Ready for the Summer” – Frankfort Kiwanis Club,

State

“Postmeniscectomy Tourniquet Palsy and Functional Sequelae”
 9/1980 KMA Annual Meeting – Louisville, KY
 9/1983 KY Chapter APTA Annual Meeting – Louisville, KY

“Assessment of Structural Changes in Rat Peripheral Nerve Resulting from Tourniquet Compression”

- 9/1984 KY Chapter APTA Annual Conference – Lexington, KY
- “Nerve Injury and Grade II and II Ankle Sprains”
9/14/1985 KY Chapter APTA – Louisville, KY
- “High Altitude Electrical Stimulation Following Rotator Cuff Repair”
9/16/1989 KY Chapter APTA – Louisville, KY
- “Perspectives in Lumbar Spine Surgery: Post-operative Exercise”
5/14/1994 KY Spine Institute – Lexington, KY
- National**
- “Postmeniscectomy Tourniquet Palsy and Functional Sequelae”
11/1981 Society of Military Orthopedic Surgeons Annual Meeting – Washington, DC
- 6/1982 APTA Annual Conference – Anaheim, CA
7/1982 American Assoc. of Orthopedic Surgeons, Sports Medicine Society, Tan Tara
 Ozark Mountains, MO
- “Electrophysiologic and Motor-End-Plate Response to Pneumatic Tourniquet Compression”
10/7/1983 Southern Society of Anatomists – Morehead City, NC
- “Assessment of Structural Changes in Peripheral Nerve Resulting from Tourniquet Compression”
4/10/1984 American Association of Clinical Anatomists – Seattle, WA
- “Comparison of Muscle Spindle Concentrations in Large and Small Human Epaxial Muscles Acting in
Parallel Combinations”
6/7/1985 American Association of Clinical Anatomists – Omaha, NE
- “Relaxation Training Revisited: An Alternative to Tensing Tense Patients”
11/19/1985 19th Annual American Assoc. of Behavior Therapists Convention – Houston, TX
- “Response of Normal Rat Skeletal Muscle to Electrical Stimulation”
4/6-10/1986 99th Annual Meeting American Assoc. of Anatomists – Reno, NV
- “Intramuscular Metrizamide or Iopamidol Does Not Produce Electromyographic Abnormalities”
9/25-27/1986 33rd Annual Meeting of the American Assoc. of Electromyography and Electrodiagnosis
 Boston, MA
- “Effects of Moderate Frequency Electrical Stimulation in Partially Denervated and Denervated Rat
Skeletal Muscle”
5/12/1987 100th Annual Meeting American Assoc. of Anatomists – Washington, DC
- “Identification of Upper Extremity Tourniquet Injury Following Carpal Tunnel Release”
6/30/1987 APTA Annual Conference – San Antonio, TX
- “Nerve Involvement Following Orthopedic Injury”
7/2/1987 Reynolds Army Hospital, Medical In-service - Fort Sill, OK
- “A Proposed Mechanoreceptor Role for the Small Redundant Muscles which Act in Parallel with Large
Prime-Movers” (David Peck, Donald F. Buxton and Arthur J. Nitz)
8/11-15/1987 Mechanoreceptor Symposium – Prague, Czechoslovakia
- “Muscle Strengthening with Electrotherapy for Clinicians”

- 2/27/1988 Edgewood, KY
- “Limb Denervation Following Anterior Cruciate (ACL) Reconstruction without Tourniquet Application”
Arthur J. Nitz
6/15/1988 APTA Annual Conference – Las Vegas, NV
- “Relaxation Training with Muscle Stretching Procedures (Charles R. Carlson, Arthur J. Nitz, Frank Collins, Ellis T. Sturgis, and James Rogers)
11/1988 22nd Annual American Assoc. of Behavior Therapists – New York, NY
- Invited Presentation – “Case Report and Single Subject Design in Orthopedic Physical Therapy Setting”
2/1/1990 Combined Sections Meeting APTA – New Orleans, LA
- “Review of Research Possibilities”
2/22/1990 KY APTA Meeting – Eastern District Meeting
- “EMG Activity of Selected Trunk and Hip Muscles During a Squat Lift-Effect of Varying the Lumbar Posture”
2/3/1991 Combined Sections Meeting, APTA – Orlando, FL
- “Effect of Two Rehabilitation Protocols on Patient Outcome Following Arthroscopic Partial Meniscectomy”
2/3/1991 Combined Sections Meeting, APTA – Orlando, FL
- “Non-surgical Rehabilitation of the Shoulder”
6/13/1992 KPTA Eastern District Meeting – Lexington, KY
- “Patellofemoral Alignment, Part I: Validity and Reliability” (David Tomsich and Arthur J. Nitz)
“Patellofemoral Alignment, Part II: Normative Values” (David Tomsich and Arthur J. Nitz)
“Muscular Strength Gains and Sensory Perception Changes; A Comparison of Electrical and Combined Electrical/Magnetic Stimulation” (Robert S. Wainner, Dean P. Currier, Arthur J. Nitz)
2/3-7/1993 APTA Combined Sections Meeting – San Antonio, TX
- “Intratester and Intertester Reliability of the Back Range of Motion Device”
2/4/1994 APTA Combined Sections Meeting – New Orleans, LA
- “Differentiation of Neck Pain vs. No Pain Conditions Using Paraspinal iEMG and Flexion-Extension Cervical ROM”
2/1995 APTA Combined Sections Meeting – Reno, NV
- “Neurongenic Inflammation Update”
8/19/1995 KPTA Eastern District Meeting – Lexington, KY
- “Role of the Rehabilitation Specialist in LBP”
8/25/1995 8th Annual Interdisciplinary Rehabilitation Symposium – Lexington, KY
- “Neck Pain and Relationships Among Cervical ROM, Forward Head, and Functional Disability”
2/12-16/1997 APTA Combined Sections Meeting – Dallas, TX
- “A Study of H-reflexes in Subjects with Acute Ankle Inversion Injuries”
“The Effect of Inversion Ankle Sprain on Flexor Digitorum Longus and Peroneus Longus H-reflex Activation”
2/16/1997 American Orthopaedic Foot and Ankle Society – San Francisco, CA

“Trained Throwers Differ from Control Subjects for Rotator Cuff Muscle Activation and Duration During Sudden Internal Rotation Perturbation”

2/1998 American Academy of Orthopaedic Surgeons – New Orleans, LA

“Response to treatment of cervical spine dysfunction using the Pronex home traction device”

2/1999 APTA Combined Sections Meeting – Seattle, WA

“Tontophoresis accelerates recovery in acute low back pain”

2/1999 APTA Combined Sections Meeting – Seattle, WA

“EMG Applications in Sports-Related Injuries”

2/16/2001 APTA Combined Sections Meeting – San Antonio, TX

6/6/2001 Spring 2001 Electroneuromyography Symposium – Park City, UT
Keynote Speaker

“Electromyographical Comparison of Open and Closed Shoulder Exercises” (Uhl, Wise, Mattacola, Nitz, Kibler)

2/16/2002 American Academy of Orthopaedic Surgeons, Specialty Day for American Shoulder and Elbow Surgeons – Dallas, TX

“Muscle Activity Comparison of 4 Common Shoulder Exercises in Unstable and Stable Shoulders” (Sciascia, Uhl, Mair, Nitz, Mattacola, McCory)

9/19-20/2002 American Society of Shoulder and Elbow Therapists – Seattle, WA

“How to Enhance Clinical Decision-Making in Physical Therapy Practice Using Electrophysiologic Testing (EMG/NCS)”

2/16/2002 KPTA Annual Conference – Covington, KY

“EMG/NCS in PT Practice Today”

6/8/2002 APTA Annual Conference – Cincinnati, OH

“EMG Analysis of Four Muscles during Three Prescribed Core Stabilization Exercises” (Nitz, Brajuha, Uhl, Mattacola)

2/13-16/2003 APTA Combined Sections Meeting – Tampa, FL

Specialty Forum – “Case Study Presentation” (Invited Presentation)

2/5/2004 APTA Combined Sections Meeting – Nashville, TN

“Pearls of Knee/Ankle Rehabilitation: What is Important?”

May 14, 2004 6th Annual UK Sports Medicine Symposium

“EMG Case Study Presentation” (Invited Presentation)

February 26, 2005 APTA Combined Sections Meeting – New Orleans, LA

“Suprascapular Neuropathy Related to a Spinoglenoid Cyst and SLAP Tear: A Case Report

April 1, 2005 16th Annual ENMG Symposium, Provo, UT

“ACL Rehabilitation: Update” Sports Medicine: 21st Century Concepts

April 22, 2005 1st Annual Kettering Sports Medicine Center Continuing Education Program
Dayton, OH

“Suprascapular Neuropathy Related to a Spinoglenoid Cyst and SLAP Tear. A Case Report.
Shaffer SW, Nitz AJ

May 21, 2005 KPTA Spring Conference

“The Effectiveness of Shoulder Slide Versus Traditional Rehabilitation Following Rotator Cuff Injury: A Randomized Clinical Trial.”

Pagorek S, Uhl T, Friedhoff G, Mair S, Wilson T, Hurt J, Mattacola C, Nitz AJ
May, 21, 2005 KPTA Spring Conference

“An Evidence-Based Course on Differential Diagnosis of Complex Shoulder Disorders”

October 15, 2005 KPTA Fall Conference, Louisville, KY

“Overview on Evaluation and Conservative Management of Low Back Pain”

May 26, 2006 Frankfort Area Mid-level Medical Practitioners

“A Comparison of Select Trunk Muscle Thickness Change between Subjects with Acute Low Back Pain Classified in the Treatment-Based Classification System and Asymptomatic Matched Controls”

Kiesel K, Malone TR, Mattacola C & Nitz A; University of Kentucky Department of Physical Medicine and Rehabilitation Annual Resident Research Day, Lexington, KY, June 2006

“Injury Prevention for High School Athletes”

June 15, 2007 Kentucky High School Athletic Association Coaches Conference

Submitted for Presentation

“The Effect of Scapular and Back Extensor Strengthening on the Thoracic Kyphosis and Functional Measures in the Health, Elderly Individual”

6/2003 APTA Annual Conference – Washington, DC

Invited Presentation

“Close Chain Evaluation and Treatment of the Foot and Ankle”

4/12-13/2003 Healthsouth – Houston Orthopedic Symposium – Houston, TX

International Presentations

“Orthopedic Research Update”

9/17/1998 Wurzburg, Germany

“Measurement of the lumbar multifidus muscle contraction with ultrasound imaging.

The Fourth Pan-Pacific Conference on Rehabilitation: Art and Science of Enablement, Hong Kong Polytechnic University, September 2004

“Dry-land Freestyle Swimming: Comparison of a Traditional and Two Multi-Planar Swim Benches”:

Spigelman T, Uhl T, Nitz A, Hill C; International Congress of Sports Medicine, Turkey, October 2007

XII. Research and/or Creative Productivity

Publications Completed

Nitz AJ, Black S, Carter GM, and Worthington JA: Oxygen Consumption for Lower Extremity Exercise in Normal Subjects and Burned Patients. Physical Therapy 60:1255-1258, 1980

Nitz AJ, and Scoville CR: Use of Ultrasound in Early Detection of Stress Fractures of the Medial Tibial Plateau. Mil. Med. 145:844-846, 1980

Nitz AJ, and Dobner JJ: Postmeniscectomy Tourniquet Palsy and Functional Sequelae, American Journal Sports Medicine 10:211-214, 1982

- Nitz AJ and Matulionis DM: Ultrastructural Changes in Rat Peripheral Nerve Following Pneumatic Tourniquet Compression. J. Neurosurg, 57:660-666, 1982
- Peck D, Buxon DF, and Nitz A: Small Muscles as “Kinesiological Monitors”: Intersegmental Exaxial Muscles of the Dog: A Preliminary Study. J. Morphol, 180:243-252, 1984
- Nitz AJ, Dobner JJ, Kersey D: Nerve Injury Following Grade II and III Ankle Sprains. Am J. Sports Medicine, 13(3):177-182, 1985
- Nitz AJ, Peck D: Comparison of Muscle Spindle Concentrations in Large and Small Human Epaxial Muscles Acting in Parallel Combinations. Am Surg. 52(5):273-277, 1986
- Greathouse DG, Nitz AJ, Matulionis DH, Currier DP: Effects of Short Term Electrical Stimulation on Ultrastructure of Rat Skeletal Muscles. Physical Therapy, 66(6):946-953, 1986
- Nitz AJ, Dobner JJ, Matulionis DH: Pneumatic Tourniquet Application and Nerve Integrity. 1. Motor Function and Electrophysiology. Exp. Neurol. 94:264-279, 1986
- Nitz AJ: Physical Therapy Management of the Shoulder. Physical Therapy 66:1912-1919, 1986
- Nitz AJ, Dobner JJ: High Intensity Electrical Stimulation Effect on Thigh Musculature During Immobilization for Knee Sprain. Physical Therapy 67:219-222, 1987
- Peck D, Burton DF, Nitz AJ: A proposed mechanoreceptor role for the small redundant muscles which act in parallel with large prime-movers. Proceedings of the Mechanoreceptor Symposium, August, 1987
- Peck D, Burton DF, Nitz AJ: A proposed mechanoreceptor role for the small redundant muscles which act in parallel with large prime-movers. Mechanoreceptor Development, Structure, and Function, 377-382, 1988
- Nitz AJ, Dobner JJ: Upper Extremity Tourniquet Injury Following Carpal Tunnel Release. Journal of Hand Surgery, 14A (3):499-504, 1989
- Nitz AJ, Dobner JJ, Matulionis DH: Morphometric analysis of alterations in rat sciatic nerve following pneumatic tourniquet compression and vascular manipulation. Anat Rec., 225(1):67-7, 1989
- Carlson CR, Collins FL, Nitz AJ, Sturgis ET, Roger JL: Relaxation training with muscle stretching procedures. J. Beth. Ther. Exp. Psychiatry, (29):29-38, 1990
- Carson C, Nitz AJ: “Negative Side Effects of Self-Regulation Training: Relaxation and the Role of the Professional in Service Delivery” (in press) Biofeedback & Self-Regulation, 1990
- Carlson C, Okeson J, Falace D, Nitz AJ, Anderson D: “Stretch-Based Relaxation and the Reduction of EMG Activity among Masticatory Muscle Pain Patients”. J Craniomandibular Disorders: Facial Oral Pain, 5:205-212, 1991
- Rooney J, Currier D, Nitz AJ: “Effect of Variation in the Burst and Carrier Frequency Modes of High Amplitude Neuromuscular Electrical Stimulation on Pain Perception of Healthy Subjects”. Physical Therapy, 27:800-809, 1992
- Noteboom T, Cruver R, Keller J, Kellogg B, Nitz A: “Tennis Elbow: A Review”. J Orthopedic Sports Physical Therapy, Vol. 19, 6:257-366, June 1994

- Carlson CR, Okeson JP, Falace DA, Curran S, Nitz AJ, Anderson D: "A comparison of psychological and physiological functioning between patients with masticatory muscle pain and matched controls". J. Craniomandibular Disorders: Facial Oral Pain, 7:15-22, 1993
- Vakos J, Nitz AJ, Shapiro R, Threlkeld AJ: "EMG activity of selected trunk and hip muscles during a squat lift: Effect of varying the lumbar posture". SPINE 19(6):687-695, 1994
- Nyland J, Brosky A, Currier D, Nitz AJ: "The Application of Motor Control Principles to Rehabilitation of the Injured Knee". J Orthopedic Sports Physical Therapy, 19:2-11, 1994
- Wilkerson GB, Nitz AJ: "Dynamic Ankle Stability: Mechanical and Neuromuscular Interrelationships". J Sports Rehab, (3):43-57, 1994
- Wainner R, Nitz AJ, Currier DP, Carlson CR: "Thigh strengthening with electrical stimulation and pulsed electromagnetic field stimulation". Resubmitted to J Orthop. Sports Phys Ther, 2000
- Carlson CR, Okeson JP, Falace DA, Nitz AJ, Lindroth JE: "Reductions of pain and EMG activity in the masseter region by trapezius trigger point injection". Pain 55:397-400, 1993
- Brosky T, Nyland J, Nitz A, Caborn DNM: The ankle ligaments: Consideration of syndesmotic injury and implications for rehabilitation. J Orthopedic Sports Physical Therapy, 21(4):197-205, 1995
- Nitz AJ: Cervical traction: Options for treating patients with back pain. Advance for Directors in Rehabilitation, 4(2):51-54, 1995
- Tomsich DA, Nitz AJ, Threlkeld AJ, Shapiro R: Patellofemoral alignment. Part I: Reliability. J Orthopedic Sports Physical Therapy, 20(3):200-208, 1996
- Nitz AJ: PRONEX Cervical Traction: Case Studies and Clinical Series Research. EMPI, Inc., January 1996
- Nyland JA, Shapiro R, Caborn DNM, Nitz AJ, Malone TR: The effect of quadriceps femoris, hamstring, and placebo eccentric fatigue on knee and ankle dynamics during crossover cutting. J Orthopedics Sports Physical Therapy, 25(5):171-184, 1997
- Carlson CR, Wynn KT, Edwards J, Okeson JP, Nitz AJ: Ambulatory EMG activity in the upper trapezius region: Muscle pain patients vs. pain-free controls. Spine 21:591-599, 1996
- Bellew JW, Malone TR, Nitz AJ, Hart AL: Gender specificity on the age-related decline of strength: concentric versus eccentric. Isokinetics and Exercise Science, (7):1-9, 1998
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- Brosky JA, Nitz AJ, Malone TR, Caborn DNM, Rayen MK: Intrarater reliability of selected outcome measures following anterior Cruciate ligament reconstruction. JOSPT. 29(1):39-48, 1999
- Hall RC, Nyland J, Nitz AJ, Pinerola J, Johnson DL: the effect of ankle effusion from acute inversion injury on flexor digitorum and peroneus longus H-reflex. JOSPT. 29(6):339-344, 1999
- Coon B, Nitz AJ: Iontophoresis and trochanteric bursitis: Literature review. Physical Therapy Case Reports, 3(4) – July/August, 2000
- Nitz AJ: Electricity of information. Rehab Management, 15(5):50-53, 2002

Uhl T, Carver RJ, Mattacola CG, Mair SD, Nitz AJ: Shoulder musculature activation during upper extremity weight-bearing exercise. JOSPT, 2003:109-117

Nitz AJ: Products at Work: Home relief: Pronex cervical traction augments improvements in the clinic. Advance for Directors in Rehabilitation, 12(8):64, 2003

Brindle TJ, Nitz AJ, Uhl TL, Kifer E, Shapiro R: Measures of accuracy for active shoulder movements at 3 different speeds with kinesthetic and visual feedback. JOSPT, 34(8): 468-478, 2004

Wise MB, Uhl TL, Mattacola CG, Nitz AJ, Kibler WB: The effect of limb support on muscle activation during shoulder exercises. J Shoulder Elbow Surg, 13: 614-620, 2004

Nitz AJ, Shaffer S: Suprascapular neuropathy related to a spinoglenoid cyst and SLAP tear. A case report, Proceedings of the 16th Annual ENMG Symposium, p. 8-9, 2006

Brindle TJ, Nitz AJ, Uhl TL, Kifer E, Shapiro R: Kinematic and EMG Characteristics of simple shoulder movements with proprioception and visual feedback. J Electromyography and Kinesiology, 16: 236-249, 2006

Brindle TJ, Uhl TL, Nitz AJ, Shapiro R: The Influence of External Loads on Movement Precision During Active Shoulder Internal Movements as Measured by Three Indices of Accuracy. J Athletic Training, 41(1): 60-66, 2006

Kiesel KB, Uhl TL, Underwood FB, Rodd DW, Nitz AJ: Measurement of lumbar multifidus muscle contraction with rehabilitative ultrasound imaging. Manual Therapy, 12(2): 161-166, 2007

Nitz AJ, Shaffer SW, Harrison AL: Effects of Aging on Neuromuscular System Function and Electrophysiological Testing, Proceedings of the 18th Annual ENMG Symposium, p. 40, 2007

Kiesel KB, Underwood FB, Matakolla C, Nitz AJ, Malone TR: A comparison of select trunk muscle thickness change between subjects with low back pain classified in the treatment-based classification system and asymptomatic controls. J Orthop Sports Phys Ther 37(10): 596-607, 2007

Manuscripts Accepted for Publication

Kiesel KB, Underwood FB, Uhl T, Nitz AJ: Measurement of Select Trunk Muscle Activation During Induced Pain, Manual Therapy, 2006 (Epub ahead of print)

Brindle TJ, Nyland JA, Nitz AJ, Shapiro R: Scapulothoracic latent muscle reaction timing comparison between trained overhead throwers and untrained control subjects. Scand J Med Sci Sports, 2006

Hazle CR, Nitz AJ: Evidence-Based Assessment and Diagnosis of Pelvic Girdle Disorders: A Proposal for an Alternate Diagnostic Category. Physical Therapy Reviews, January 2008

Manuscripts Submitted for Publication

Nitz AJ, Carlson CR, Bellew JW: The differentiation of pain vs. no-pain conditions in the cervical region using EMG activity during flexion-extension range of motion. J Sports Med., 2000

Walsh RM, Nitz AJ: Sensitivity to change of three modified forms of the Roland Morris Disability Questionnaire. Spine, 2000

Nitz AJ, Brown TC: Response to treatment of cervical spine dysfunction using a novel home traction device. Case report and clinical series. J Orthop Sports Phys Ther, 2000

Nitz AJ, Kiesel KB: Evidence-based practice Review: Motor control exercise approach as an intervention for low back pain, JOSPT, (invited review), 2005

Brajuha DA, Nitz AJ, Mattacola CG, Uhl TL, Bolgla L, Kiesel K: Electromyographic analysis of trunk muscles during three core stabilization exercises. JOSPT, 2004 (in review)

Robinson K, Dietrich M, Nitz AJ, Threlkeld AJ: Effects of exercise induced muscular fatigue on the kinetics and electromyographic activity of a single-leg vertical jump in healthy men. JOSPT, 2005 (In review)

Manuscripts in Preparation:

Nitz AJ, Dobner JJ: Incidence and distribution of upper extremity electromyographic abnormalities following proximal humeral fractures. Physical Therapy

Nitz AJ: Electromyographic findings in patients with thoracic back pain. Physical Therapy

Cruver RW, Nitz AJ: Effect of three rehabilitation protocols on patient outcome following arthroscopic partial meniscectomy. J Orthopedic Sports Physical Therapy

Nitz AJ: "Limb denervation following anterior cruciate ligament reconstruction without tourniquet application". J Orthopedic Sports Physical Therapy

Book Chapters

Nitz AJ: Effects of pressure on peripheral nerve function. In Dynamics of Human Biologic Tissues: F.A. Davis, Philadelphia, PA., 1992, pp. 205-230

Nitz AJ, Nyland J, Brosky J, Kaborn D: Neural Control of Movement from an Orthopedic Perspective in Functional Evaluation and Outcomes in Sports and Orthopedic Physical Therapy, Churchill Livingstone, New York, 1996

Malone TR, Kuperstein J, Nitz AJ: Neurologic Implications for Rehabilitation of the Knee in Knee Ligament Rehabilitation, Churchill Livingstone, New York, 1999

Nitz AJ, Kitzman PH: Bone Injury and Repair in Orthopaedic Physical Therapy Secrets, Boyce DA, Placzek J, eds, Hanley & Belfus, Inc, Philadelphia, 2001, pp. 22-27

Nitz AJ: Soft Tissue Injury and Repair in Orthopaedic Physical Therapy Secrets, Boyce DA, Placzek J, eds, Hanley & Belfus, Inc. Philadelphia, 2001, pp. 17-22

Nitz AJ, Kitzman PH: Bone Injury and Repair in Orthopaedic Physical Therapy Secrets, Boyce DA, Placzek J, eds., 2nd Ed., Hanley & Belfus, Inc., Philadelphia, 2006

Nitz AJ, Kitzman PH: Soft Tissue Injury and Repair in Orthopaedic Physical Therapy Secrets, Boyce DA, Placzek J, eds., 2nd Ed., Hanley & Belfus, Inc., Philadelphia, 2006

Textbook

Malone TR, McPoil T, Nitz AJ: Orthopedic and Sports Physical Therapy, Editors, 3rd Edition, CV Mosby, St. Louis, MO, 1997

Chapter 5: Gradisar IA, Nitz AJ: Fracture Stabilization and Healing

Chapter 7: Nitz AJ, Bellew JW, Hazle CR: Evaluation of Musculoskeletal Disorders

Chapter 8: Hall RC, Nitz AJ: Basic Concepts of Orthopedic Manual Therapy

Instructor's Manual to accompany Orthopedic and Sports Physical Therapy, 3rd Edition, 1997

Monograph

Current Concepts in Orthopedic Physical Therapy: Cervical Spine
Orthopedic Section, APTA – Home Study Course, 2001

Current Concepts in Rehabilitation of the Knee: Proprioception and Neuromuscular Control for
the Lower Extremity, APTA – Home Study Course, 2004

Abstracts

Nitz A: Invited Abstract: “Peripheral Nerve Division for Relentless Ischemic Foot Pain”

Albert J, Brief DK, Brener BJ, et al, Arch Surg 111:557-560, 1976 in Phys Ther 57(3):329, 1977

Nitz AJ, Dobner JJ: Postmeniscectomy Tourniquet Palsy and Functional Sequelae. Phys Ther 62(5):672, 1982

Nitz AJ, Matulionis DM: Electrophysiologic and Motor End-Plate Response to Pneumatic Tourniquet Compression. Anat. Rec. 208:473-474, 1984

Nitz AJ, Matulionis DM: Ultrastructural Alterations in Rat Sciatic Nerve Following Pneumatic Tourniquet Compression, Arterial Ligation and Epineurectomy. Anat. Rec., 208(3):127A-128A, 1984

Greathouse DG, Nitz AJ, Matulionis D, Currier DP: Effects of Electrical Stimulation on Ultrastructure of Rat Skeletal Muscles. Phys Ther 64:755-756, 1984

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Greathouse DG, Currier DP, Nitz AJ, Matulionis DH: Effects of Moderate Frequency Electrical Stimulation on Partially Denervated and Denervated Rat Skeletal Muscle. Anat. Rec. 218:52A-53A, 1987

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- Carlson CR, Wynn KT, Edwards J, Okeson JP, Nitz AJ: Ambulatory EMG Activity: Muscle Pain Patients vs. Pain-free Controls. Soc. Of Behavioral Medicine
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- Hall RC, Pinerola J, Nitz AJ, Malone TR, et al: A study of H-reflexes in subjects with acute ankle inversion injuries. J Ortho Sports Phys Ther, 25(1):92, 1997
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- Hazle CR, Nitz AJ: The effect of manual therapy to the cervical spine on postural sway in traumatic cervical spine injuries. *Physical Therapy – online*, June, 2002
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- Sciasia AD, Uhl TL, Mattacola CG, McCrory JL, Nitz AJ, Mair SD: Muscle activity comparison of four common shoulder exercises in unstable and stable shoulders *J Athletic Training* 38(2):S-9, 2003
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- Mulvihill CP, Mattacola CG, Nitz AJ, Uhl TL: Effect of foot orthotics on balance and the muscle activity of selected leg muscles during bilateral stance. *J Athletic Training* 39(2): S-39, 2004
- Brindle TJ, Uhl TL, Nitz AJ, Shapiro R: Joint position sense of loaded and unloaded active shoulder internal rotation movements. *J Athletic Training* 39(2): S-65, 2004
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- Kiesel K, Underwood F, Nitz AJ: Rehabilitative ultrasound imaging of the lumbar multifidus muscle: the parasagittal view. *JOSPT* 36(8): A11-A12, 2006
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- Briggs DJ, Mattacola CG, Uhl TL, Nitz AJ: Comparison of navicular drop versus an arch height index in classifying the foot. *J Athletic Training*, 41(2): S17, 2006
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- Sesma AR, Mattacola CG, Uhl TL, Nitz AJ, Volpini SS, Primm D: Immediate effect of foot orthotics on dynamic balance in subjects with chronic ankle instability. *JOSPT* 36(11): A-17, 2006

Book Reviews

Peripheral Nerve Disorders: A Practical Approach, London, Butterworth (Ltd.) 1984 in Phys Ther 66:870, 1986

Prospective Textbook – W.B. Saunders, August, 1987

XV. Grant Activity

Nelson KR, Nitz AJ: Evaluation of nerve conduction by demyelinated axons following slow calcium channel blockade. Dept. of Neurology, University of Kentucky Medical Center; BSRG; Dec. 1985-1986
\$8,000

PSP Research Fund

Nelson KR, Nitz AJ: Is calcium a factor in the etiology of diabetic peripheral neuropathy? Dept. of Neurology, University of Kentucky Medical Center, August 1986-August 1987.
\$4,000

Grant Proposal submitted to: Foundation for Physical Therapy: Efficacy of Myofascial Release and Stretch-Based Relaxation for Upper Trapezius Muscle Pain. Nitz AJ, Carlson CR (not funded) Nov., 1990
\$50,900

Walsh RM, Nitz AJ (co-principal investigator): Iontophoresis accelerates Recovery in Acute Low Back Pain (IRB-96-002110)

Research Equipment Support – EMPI, Inc. \$6,000
Kentucky Physical Therapy Association, Research Grant \$527

Coon B, Nitz AJ: Treatment plan for piriformis syndrome utilizing iontophoresis Literature search. (Faculty Contact)
APTA – Private Practice Section, 1997
\$500

Equipment grants from manufacturers – (1984-1991) \$17,200

Automated tourniquet system:
ATS 1000 (\$6,000)
Aspen Labs, Inc.
Englewood, CO

Electro Stim – 180 2i (\$3,400)
Nu-Med, Inc.
333 N. Hammes Ave.
Joliet, IL

Shoulder CPM (\$7,000)
Richards Medical
Memphis, TN

Early, controlled active knee/ankle motion system (\$800)
REHAB USA
Okomos, MI

Neurometer
Neurotron, Inc \$8,000
Baltimore, MD

