

**STATE OF CONNECTICUT WORKERS' COMPENSATION COMMISSION
MEDICAL PROTOCOLS
CERVICAL MUSCULOLIGAMENTOUS INJURY (ACUTE)**

BACKGROUND

Injuries may occur on the job, including operation of motor vehicle as it relates to patient's employment. Symptoms are believed to be related to a severe stretching or tearing of the soft tissues (muscles, fascia, ligaments, facet joint capsule, etc.). This may be associated, in addition to neck pain, with upper extremity complaints. Initially there is severe limitation of the range of motion and spasm.

DIAGNOSTIC CRITERIA

Historical and Physical Findings

Onset of neck pain and parispinal muscle spasms begins suddenly after injury or may develop gradually over the next 24 hours. Pain is generally aggravated by limited motion of the neck and frequently relieved by rest. Pain may radiate below the shoulder. It can be accompanied by paresthesia or sense of weakness in upper extremities related to the muscle spasm in the neck. Physical findings include tenderness to palpation, spasm of the paravertebral muscles and aggravation of pain with motion. Neurological examination and nerve root stretch tests are usually negative.

APPROPRIATE DIAGNOSTIC STUDIES

In general, no more than 5 view AP lateral, both oblique and open mouth x-rays are probably indicated.

INAPPROPRIATE DIAGNOSTIC STUDIES

1. CT Scan
2. MRI
3. Bone Scan
4. Myelography
5. EMG
6. Thermogram (never appropriate)

APPROPRIATE TREATMENT

Weeks 1-2: Out-patient Treatment

Treatment may be initiated as early as the first day of injury. Indications for and focus of early intervention include:

- a. Acute management of pain/spasms
- b. Limited use of passive modalities, except unlimited ice
- c. Instruction in ROM/stretching exercises for neck/shoulder muscles
- d. Assessment of return to work readiness and identifying necessary work modifications. For a patient who is totally disabled, the period of disability should not exceed 2 weeks.
- e. Patient education in healing process and body mechanics
- f. No more than 5 physical medicine treatments in the first calendar week, and no more than 3 physical medicine treatments in the second calendar week.
- g. Pain medication, non-narcotic; muscle relaxants; anti-inflammatory drugs, non-steroidal.¹

Weeks 2-6:

If patient has not responded to said treatments in 2 weeks time, physical medicine treatments may be continued for a maximum of 3 times a week for the next 2 weeks. A maximum of 4 doctor visits during the first 4 weeks. If patient is not completely healed, but is getting better, conservative physical medicine treatment twice a week should be continued for no more than 2 additional weeks.

Week 6:

If patient has not responded in 4-6 weeks, patient must be referred to a Neurosurgeon or Orthopedic Surgeon (if one was not treating him/her during the first 4-6 weeks). Said specialist may order further diagnostic procedures: x-ray if not already taken; MRI or bone scan if indicated. Failure to respond to conservative treatment brings with it the distinct possibility of a different diagnosis.

REFERRAL

1. Original treating physician, i.e., Chiropractic Physician, Internist, or Orthopedic Physician, shall refer the patient to another specialist for further diagnostic tests at the end of 6 weeks if the patient is not healed. If the diagnostic test does not indicate surgery but further conservative treatment, the specialist, i.e., Orthopedic Surgeon or Neurosurgeon, shall refer the patient back to the initial treating physician. If it is recommended that additional physical medicine is necessary, it shall be referred to the employer or his representative for determination. If physical medicine is denied by said employer or his representative, then the patient may request same from the appropriate Workers' Compensation Commissioner.
2. If surgery is indicated, the specialist should perform the surgery. The specialist will continue to treat the patient after surgery, and it is expected that the patient will be returned to work 6 to 12 weeks after surgery. The surgeon should make said determination.

INAPPROPRIATE TREATMENT

- a. Exclusive use of passive (palliative) modalities; TENS is not indicated. Cervical traction is not indicated.²
- b. Narcotic medication for a prolonged period of time.³
- c. In-patient treatment

RETURN TO WORK

1. Fusion surgery: total disability up to 8 weeks. Temporary modified light duty after 8 weeks up to 12 weeks. Return to full duty after 12 weeks.
2. Hemilaminectomy or Discectomy surgery: total disability up to 4 weeks. Return to modified light duty after 4 weeks up to 8 weeks. Return to full duty after 8 weeks.

¹ United States Department of Health and Human Services, Acute Low Back Problems in Adults: Assessment and Treatment, (Rockville, MD: Agency for Health Care Policy and Research, 1994), p. 1.

² U.S. Dept. of Health and Human Services, p.12.

³ U. S. Dept. of Health and Human Services, pp. 10-11.

STATE OF CONNECTICUT WORKERS' COMPENSATION COMMISSION
 MEDICAL PROTOCOLS
 CERVICAL MUSCULOLIGAMENTOUS INJURY (MILD/MODERATE)

BACKGROUND

Injuries may occur on the job, including operation of motor vehicle as it relates to patient's employment. Symptoms are believed to be related to a severe stretching or tearing of the soft tissues (muscles, fascia, ligaments, facet joint capsule, etc.). This may be associated, in addition to neck pain, with upper extremity complaints. Initially there is severe limitation of the range of motion and spasm.

DIAGNOSTIC CRITERIA

Historical and Physical Findings
 Onset of neck pain and parispinal muscle spasms begins suddenly after injury or may develop gradually over the next 24 hours. Pain is generally aggravated by limited motion of the neck and frequently relieved by rest. Pain may radiate below the shoulder. It can be accompanied by paresthesia or sense of weakness in upper extremities related to the muscle spasm in the neck. Physical findings include tenderness to palpation, spasm of the paravertebral muscles and aggravation of pain with motion. Neurological examination and nerve root stretch tests are usually negative.

APPROPRIATE DIAGNOSTIC STUDIES

In general, no more than 5 view AP lateral, both oblique and open mouth x-rays are probably indicated.

INAPPROPRIATE DIAGNOSTIC STUDIES

1. CT Scan
2. MRI
3. Bone Scan
4. Myelography
5. EMG
6. Thermogram (never appropriate)

APPROPRIATE TREATMENT

Weeks 1-2: Out-patient Treatment
 Treatment may be initiated as early as the first day of injury. Indications for and focus of early intervention include:

- a. Acute management of pain/spasms
- b. Limited use of passive modalities, except unlimited ice
- c. Instruction in ROM/stretching exercises for neck/shoulder muscles
- d. Patient should not have lost time from work.
- e. Patient education in healing process and body mechanics
- f. No more than 5 physical medicine treatments in the first calendar week, and no more than 3 physical medicine treatments in the second calendar week, and on rare occasions up to 2 physical medicine treatments in the third calendar week.
- g. Pain medication, non-narcotic; muscle relaxants; anti-inflammatory drugs, non-steroidal.¹

Weeks 2-6:
 If patient has not responded to said treatments in 2 weeks time, physical medicine treatments may be continued for a maximum of 2 times a week for the next 2 weeks. There should be a maximum of 3 doctor visits during the next 3 weeks. If patient is not completely healed, but is getting better, conservative treatment twice a week should be continued for no more than 2 additional weeks.

REFERRAL

None

INAPPROPRIATE TREATMENT

- a. Exclusive use of passive (palliative) modalities; TENS is not indicated. Cervical traction is not indicated.²
- b. Narcotic medication for a prolonged period of time.³
- c. In-patient treatment

RETURN TO WORK

N/A

¹United States Department of Health and Human Services, Acute Low Back Problems in Adults: Assessment and Treatment, (Rockville, MD: Agency for Health Care Policy and Research, 1994), p. 1.
² U.S. Dept. of Health and Human Services, p.12.
³ U.S. Dept. of Health and Human Services, pp. 10-11.

**STATE OF CONNECTICUT WORKERS' COMPENSATION COMMISSION
MEDICAL PROTOCOLS**

LUMBAR MUSCULOLIGAMENTOUS INJURY (ACUTE)

BACKGROUND

Injuries may occur on the job, including operation of motor vehicle as it relates to patient's employment. Symptoms are believed to be related to a severe stretching or tearing of the soft tissues (muscles, fascia, ligaments, facet joint capsule, etc.). This may be associated, in addition to back pain, with lower extremity complaints. Initially there is severe limitation of the range of motion and spasm.

DIAGNOSTIC CRITERIA

Historical and Physical Findings

Onset of back pain and paraspinal muscle spasms begins suddenly after injury or may develop gradually over the next 24 hours. Pain is generally aggravated by limited motion of the back and frequently relieved by rest. Pain may radiate below the back. It can be accompanied by paresthesia or sense of weakness in lower extremities related to the muscle spasm in the back. Physical findings include tenderness to palpation, spasm of the paravertebral muscles and aggravation of pain with motion. Neurological examination and nerve root stretch tests are usually negative.

APPROPRIATE DIAGNOSTIC STUDIES

In general, no more than 5 view AP lateral, both oblique and coned down view of L5-S1 are probably indicated.

INAPPROPRIATE DIAGNOSTIC STUDIES

1. CT Scan
2. MRI
3. Bone Scan
4. Myelography
5. EMG
6. Thermogram (never appropriate)

APPROPRIATE TREATMENT

Weeks 1-2: Out-patient Treatment

Treatment may be initiated as early as the first day of injury. Indications for and focus of early intervention include:

- a. Acute management of pain/spasms
- b. Limited use of passive modalities, except unlimited ice
- c. Instruction in ROM/stretching exercises for back muscles
- d. Assessment of return to work readiness and identifying necessary work modifications. For a patient who is totally disabled, the period of disability should not exceed 2 weeks.¹
- e. Patient education in healing process and body mechanics
- f. No more than 5 physical medicine treatments in the first calendar week, and no more than 3 physical medicine treatments in the second calendar week.
- g. Pain medications, non-narcotic; muscle relaxants; anti-inflammatory drugs, non-steroidal.²

Weeks 2-6:

If patient has not responded to said treatments in 2 weeks time, physical medicine treatments may be continued for a maximum of 3 times a week for the next 4 weeks. A maximum of 4 doctor visits during the first 4 weeks. If patient is not completely healed, but is getting better, conservative treatment twice a week should be continued for no more than 2 additional weeks.

Week 6:

If patient has not responded in 4-6 weeks, patient must be referred to a Neurosurgeon or Orthopedic Surgeon (if one was not treating him during the first 4-6 weeks). Said specialist may order further diagnostic procedures: x-ray if not already taken; MRI or bone scan if indicated. Failure to respond to conservative treatment brings with it the distinct possibility of a different diagnosis..

REFERRAL

1. Original treating physician, i.e., Chiropractic Physician, Internist, or Orthopedic Physician, shall refer the patient to another specialist for further diagnostic tests at the end of 6 weeks if the patient has not responded and is not working. If the diagnostic test does not indicate surgery but further conservative treatment, the specialist, i.e., Orthopedic Surgeon or Neurosurgeon, shall refer the patient back to the initial treating physician. If it is recommended that additional physical medicine is necessary, it shall be referred to the employer or his representative for determination. If physical medicine is denied by said employer or his representative, then the patient may request same from the appropriate Workers' Compensation Commissioner.

2. If surgery is indicated, the specialist should perform the surgery. The specialist will continue to treat the patient after surgery and it is expected that the patient will be returned to work 6 to 12 weeks after the surgery. The surgeon should make said determination.

INAPPROPRIATE TREATMENT

- a. Exclusive use of passive (palliative) modalities; TENS is not indicated. Also lumbar traction is not indicated.³
- b. Narcotic medication for a prolonged period of time.⁴
- c. In-patient treatment

RETURN TO WORK

1. Hemilaminectomy or Discectomy surgery: total disability up to 4 weeks. Return to modified light duty after 4 weeks up to 8 weeks. Return to full duty after 8 weeks.

2. Fusion surgery: total disability up to 12 weeks. Temporary modified light duty after 12 up to 16 weeks. Return to full duty after 16 to 20 weeks.

¹ Mandell, Peter J., et al, "Isokinetic Trunk Strength and Lifting Strength Measures," SPINE 16 (1993) 2491-2501.

² United States Department of Health and Human Services, Acute Low Back Problems in Adults: Assessment and Treatment, (Rockville, MD: Agency for Health Care Policy and Research, 1994), p.

³ U.S. Dept. of Health and Human Services, p. 12.

⁴ U.S. Dept. of Health and Human Services, pp. 10-11.

**STATE OF CONNECTICUT WORKERS' COMPENSATION COMMISSION
MEDICAL PROTOCOLS
LUMBAR MUSCULOLIGAMENTOUS INJURY (MILD/MODERATE)**

BACKGROUND

Injuries may occur on the job, including operation of motor vehicle as it relates to patient's employment. Symptoms are believed to be related to a severe stretching or tearing of the soft tissues (muscles, fascia, ligaments, facet joint capsule, etc.). This may be associated, in addition to back pain, with lower extremity complaints. Initially there is severe limitation of the range of motion and spasm.

DIAGNOSTIC CRITERIA

Historical and Physical Findings
Onset of back pain and paraspinal muscle spasms begins suddenly after injury or may develop gradually over the next 24 hours. Pain is generally aggravated by limited motion of the back and frequently relieved by rest. Pain may radiate below the back. It can be accompanied by paresthesia or sense of weakness in lower extremities related to the muscle spasm in the back. Physical findings include tenderness to palpation, spasm of the paravertebral muscles and aggravation of pain with motion. Neurological examination and nerve root stretch tests are usually negative.

APPROPRIATE DIAGNOSTIC STUDIES

In general, no more than 5 view AP lateral, both oblique and coned down view of L5-S1 are probably indicated.

INAPPROPRIATE DIAGNOSTIC STUDIES

1. CT Scan
2. MRI
3. Bone Scan
4. Myelography
5. EMG
6. Thermogram (never appropriate)

APPROPRIATE TREATMENT

Weeks 1-2: Out-patient Treatment

Treatment may be initiated as early as the first day of injury. Indications for and focus of early intervention include:

- a. Acute management of pain/spasms
- b. Limited use of passive modalities, except unlimited ice
- c. Instruction in ROM/stretching exercises for back muscles
- d. Patient should not have lost time from work.
- e. Patient education in healing process and body mechanics
- f. No more than 5 physical medicine treatments in the first calendar week, and no more than 3 physical medicine treatments in the second calendar week; and on rare occasions up to 2 physical medicine treatments in the third calendar week.
- g. Pain medication, non-narcotic; muscle relaxants; anti-inflammatory drugs, non-steroidal.¹

Weeks 2-6:

If patient has not responded to said treatments in 2 weeks time, physical medicine treatments should be continued for a maximum of 2 times a week for the next 2 weeks. There should be a maximum of 3 doctor visits during the next 3 weeks. If patient is not completely healed, but is getting better, conservative treatment twice a week should be continued for no more than 2 additional weeks.

Week 6:

If patient has not responded in 4-6 weeks, patient must be referred to a Neurosurgeon or Orthopedic Surgeon (if one was not treating him during the first 4-6 weeks). Said specialist may order further diagnostic procedures: x-ray if not already taken; MRI or bone scan if indicated. Failure to respond to conservative treatment brings with it the distinct possibility of a different diagnosis..

REFERRAL

None

INAPPROPRIATE TREATMENT

- a. Exclusive use of passive (palliative) modalities; TENS is not indicated. Also lumbar traction is not indicated.²
- b. Narcotic medication for a prolonged period of time.³
- c. In-patient treatment

RETURN TO WORK

N/A

¹United States Department of Health and Human Services, Acute Low Back problems in Adults: Assessment and Treatment, (Rockville, MD: Agency for Health Care Policy and Research, 1994), p. 1.

²U.S. Dept. of Health and Human Services, p. 12.

³U.S. Dept. of Health and Human Services, pp. 10-11.

**STATE OF CONNECTICUT WORKERS' COMPENSATION COMMISSION
MEDICAL PROTOCOLS**

ARM MUSCULOLIGAMENTOUS INJURY (from the elbow up to, but not including, the neck)

BACKGROUND

Injuries may occur on the job, including operation of motor vehicle as it relates to patient's employment. Symptoms are believed to be related to a severe stretching or tearing of the soft tissues (muscles, fascia, ligaments, facet joint capsule, etc.). This may be associated, in addition to shoulder pain, with upper extremity complaints. Initially there is severe limitation of the range of motion and spasm.

DIAGNOSTIC CRITERIA

Historical and Physical Findings
Onset of shoulder pain and paraspinal muscle spasms begins suddenly after injury or may develop gradually over the next 24 hours. Pain is generally aggravated by limited motion of the shoulder or arm and is frequently relieved by rest. Pain may radiate below the shoulder. It can be accompanied by paresthesia or sense of weakness in upper extremities related to the muscle spasm in the shoulder or arm. Physical findings include tenderness to palpation, spasm of the paravertebral muscles and aggravation of pain with motion. Neurological examination and nerve root stretch tests are usually negative.

APPROPRIATE DIAGNOSTIC STUDIES

In general, in an acute, severe injury, when you have deformity, pain, swelling, severe loss of motion, x-rays are probably indicated. These x-rays would include an AP view internal and external rotation and some type of lateral view to be determined by the practitioner.

INAPPROPRIATE DIAGNOSTIC STUDIES

1. CT Scan
2. MRI
3. Bone Scan
4. Arthrogram
5. EMG
6. Thermogram (never appropriate)

APPROPRIATE TREATMENT

Weeks 1-2: Out-patient Treatment

Treatment may be initiated as early as the first day of injury. Indications for and focus of early intervention include:

- a. Acute management of pain/spasms
- b. Limited use of passive modalities, except unlimited ice
- c. Instruction in ROM/stretching exercises for arm/shoulder muscles
- d. Assessment of return to work readiness and identifying necessary work modifications. For a patient who is totally disabled, the period of disability should not exceed 2 weeks.
- e. Patient education in healing process and body mechanics
- f. No more than 5 physical medicine treatments in the first calendar week, and no more than 3 physical medicine treatments in the second calendar week.
- g. Pain medication, non-narcotic; muscle relaxants; anti-inflammatory drugs, non-steroidal.

Weeks 2-6:

If patient has not demonstrated objective signs of improvement in 2 weeks time, physical medicine treatments may be continued for a maximum of 3 times a week for the next 3 weeks. A maximum of 4 doctor visits during the first 4 weeks. If patient is not completely healed, but is getting better, conservative treatment twice a week should be continued for no more than 2 additional weeks.

Week 6:

If patient has not responded in 4-6 weeks time, patient must be referred to an Orthopedic Surgeon (if one was not treating him/her during the first 4-6 weeks). Said specialist may order further diagnostic procedures: x-ray if not already taken; MRI or arthrogram if indicated. Failure to respond to conservative treatment brings with it the distinct possibility of a different diagnosis..

REFERRAL

1. Original treating physician, i.e., Chiropractic Physician, Internist, or Orthopedic Surgeon, shall refer the patient to another specialist (except the Orthopedic Surgeon) for further diagnostic tests at the end of 6 weeks if the patient is not healed. If the diagnostic test does not indicate surgery but further conservative treatment, the Orthopedic Surgeon shall refer the patient back to the initial treating physician. If it is recommended that additional physical medicine is necessary, it shall be referred to the employer or his representative for determination. If physical medicine is denied by said employer or his representative, then the patient may request same from the appropriate Workers' Compensation Commissioner.

2. If surgery is indicated, the Orthopedic Surgeon should perform the surgery. The Orthopedic Surgeon will continue to treat the patient after surgery and it is expected that the patient will be returned to work 4 to 6 weeks after surgery. The surgeon should make said determination.

INAPPROPRIATE TREATMENT

- a. Exclusive use of passive (palliative) modalities; TENS is not indicated.
- b. Narcotic medication for a prolonged period of time.
- c. In-patient treatment

RETURN TO WORK

Total disability after surgery is 4 to 6 weeks. Temporary modified light duty is 4 to 6 weeks. Return to full duty is after 8 to 12 weeks.

**STATE OF CONNECTICUT WORKERS' COMPENSATION COMMISSION
MEDICAL PROTOCOLS**

HAND MUSCULOLIGAMENTOUS INJURY (from the wrist to the elbow)

BACKGROUND

These injuries may occur on the job, including operation of motor vehicle as it relates to patient's employment. Symptoms are believed to be related to a severe stretching or tearing of the soft tissues (muscles, fascia, ligaments, etc.). This may be associated, in addition to wrist/elbow pain, with upper extremity complaints. Initially there is severe limitation of the range of motion and spasm.

DIAGNOSTIC CRITERIA

Historical and Physical Findings
Onset of wrist/elbow pain begins suddenly after injury or may develop gradually over the next 24 hours. Pain is generally aggravated by limited motion of the wrist/elbow and is frequently relieved by rest. Pain may radiate below the elbow. It can be accompanied by paresthesia or sense of weakness in the elbow or wrist related to the muscle spasm in the elbow or wrist. Physical findings include tenderness to palpation and aggravation of pain with motion.

APPROPRIATE DIAGNOSTIC STUDIES

In general, in an acute, severe injury, the appropriate x-rays are an AP, and allow a pre and post reduction film if a dislocation has been present.

INAPPROPRIATE DIAGNOSTIC STUDIES

1. CT Scan
2. MRI
3. Bone Scan
4. Arthrogram
5. EMG
6. Thermogram (never appropriate)

APPROPRIATE TREATMENT

Weeks 1-2: Out-patient Treatment

Treatment may be initiated as early as the first day of injury. Indications for and focus of early intervention include:

- a. Acute management of pain/spasms
- b. Limited use of passive modalities, except unlimited ice
- c. Instruction in ROM/stretching exercises for elbow/forearm muscles
- d. Assessment of return to work readiness and identifying necessary work modifications. For a patient who is totally disabled, the period of disability should not exceed 1 week.
- e. Patient education in healing process and body mechanics
- f. No more than 5 physical medicine treatments in the first calendar week, and no more than 3 physical medicine treatments in the second calendar week.
- g. Pain medication, non-narcotic; muscle relaxants; anti-inflammatory drugs, non-steroidal.

Weeks 2-6:

If patient has not responded in 1 week time, physical medicine treatments may be continued for a maximum of 3 times a week for the next 3 weeks. A maximum of no more than 4 doctor visits during the first 4 weeks. If patient is not completely healed, but is getting better, conservative treatment twice a week should be continued for no more than 2 additional weeks.

Week 6:

If patient has not responded in 4-6 weeks time, patient must be referred to a Plastic Surgeon or Orthopedic Surgeon (if one was not treating him/her during the first 4-6 weeks). Said specialist may order further diagnostic procedures: x-ray if not already taken; MRI or arthrogram if indicated. Failure to respond to conservative treatment brings with it the distinct possibility of a different diagnosis..

REFERRAL

1. Original treating physician, i.e., Chiropractic Physician, Internist, or Orthopedic Surgeon, shall refer the patient to another specialist (except the Orthopedic Surgeon) for further diagnostic tests at the end of 6 weeks if the patient is not healed. If the diagnostic test does not indicate surgery but further conservative treatment, the specialist, i.e., Plastic Surgeon or Orthopedic Surgeon, shall refer the patient back to the initial treating physician. If it is recommended that additional physical medicine is necessary, it shall be referred to the employer or his representative for determination. If physical medicine is denied by said employer or his representative, then the patient may request same from the appropriate Workers' Compensation Commissioner.

2. If surgery is indicated, the specialist should perform the surgery. The specialist will continue to treat the patient after surgery and it is expected that the patient will be returned to work 2 to 4 weeks after surgery. The surgeon should make said determination.

INAPPROPRIATE TREATMENT

- a. Exclusive use of passive (palliative) modalities; TENS is not indicated.
- b. Narcotic medication for a prolonged period of time.
- c. In-patient treatment

RETURN TO WORK

Total disability after surgery may be 2 to 4 weeks. Return to modified light duty is 2 to 4 weeks, and return to full duty after up to 8 weeks.

**STATE OF CONNECTICUT WORKERS' COMPENSATION COMMISSION
MEDICAL PROTOCOLS**

LEG MUSCULOLIGAMENTOUS INJURY (loss at or above the knee)

BACKGROUND

These injuries may occur on the job, including operation of motor vehicle as it relates to patient's employment. Symptoms are believed to be related to a severe stretching or tearing of the soft tissues (muscles, fascia, ligaments, facet joint capsule, etc.). This may be associated, in addition to leg pain, with lower extremity complaints. Initially there is severe limitation of the range of motion and spasm.

DIAGNOSTIC CRITERIA

Historical and Physical Findings
Onset of leg pain and paraspinal muscle spasms begins suddenly after injury or may develop gradually over the next 24 hours. Pain is generally aggravated by limited motion of the leg and is frequently relieved by rest. Pain may radiate below the leg and can be accompanied by paresthesia or sense of weakness in the lower extremities related to the spasm in the leg. Physical findings include tenderness to palpation, spasm of the paravertebral muscles and aggravation of pain with motion. Neurological examination and nerve root stretch tests are usually negative.

APPROPRIATE DIAGNOSTIC STUDIES

In general, in an acute, severe injury, when there is deformity, pain, swelling, severe loss of motion, x-rays are probably indicated. These x-rays should include an AP view and lateral view of the affected area to be determined by the practitioner.

INAPPROPRIATE DIAGNOSTIC STUDIES

1. CT Scan
2. MRI
3. Bone Scan
4. Arthrogram
5. EMG
6. Thermogram (never appropriate)

APPROPRIATE TREATMENT

Weeks 1-2: Out-patient Treatment

Treatment may be initiated as early as the first day of injury. Indications for and focus of early intervention include:

- a. Acute management of pain/spasms
- b. Limited use of passive modalities, except unlimited ice
- c. Instruction in ROM/stretching exercises for leg muscles
- d. Assessment of return to work readiness and identifying necessary work modifications. For a patient who is totally disabled, the period of disability should not exceed 2 weeks.
- e. Patient education in healing process and body mechanics
- f. No more than 5 physical medicine treatments in the first calendar week, and no more than 3 physical medicine treatments in the second calendar week.
- g. Pain medication, non-narcotic; muscle relaxants; anti-inflammatory drugs, non-steroidal.

Weeks 2-6:

If patient has not demonstrated objective signs of improvement in 2 weeks time, physical medicine treatments may be continued for a maximum of 3 times a week for the next 3 weeks. A maximum of no more than 4 doctor visits during the first 4 weeks. If patient is not completely healed, but is getting better, conservative treatment twice a week should be continued for no more than 2 additional weeks.

Week 6:

If patient has not responded in 4-6 weeks time, patient must be referred to an Orthopedic Surgeon (if one was not treating him/her during the first 4-6 weeks). Said specialist may order further diagnostic procedures: x-ray if not already taken; MRI or arthrogram if indicated. Failure to respond to conservative treatment brings with it the distinct possibility of a different diagnosis.

REFERRAL

1. Original treating physician, i.e., Chiropractic Physician, Internist, or Orthopedic Surgeon, shall refer the patient to another specialist (except the Orthopedic Surgeon) for further diagnostic tests at the end of 6 weeks if the patient is not healed. If the diagnostic test does not indicate surgery but further conservative treatment, the specialist shall refer the patient back to the initial treating physician. If it is recommended that additional physical medicine is necessary, it shall be referred to the employer or his representative for determination. If physical medicine is denied by said employer or his representative, then the patient may request same from the appropriate Workers' Compensation Commissioner.

2. If surgery is indicated, the Orthopedic Surgeon should perform the surgery. The surgeon will continue to treat the patient after surgery and it is expected that the patient will be returned to work 4 to 6 weeks after surgery. The surgeon should make said determination.

INAPPROPRIATE TREATMENT

- a. Exclusive use of passive (palliative) modalities; TENS is not indicated.
- b. Narcotic medication for a prolonged period of time.
- c. In-patient treatment

RETURN TO WORK

Total disability after surgery is 4 to 6 weeks. Temporary modified light duty is 4 to 6 weeks, and return to full duty is after 8 to 12 weeks.