# Chapter 6

## Overview of Survey Response

In 1991, the National Board of Chiropractic Examiners conducted a survey and in 1993 published a report of the survey data entitled *Job Analysis of Chiropractic* (Christensen and Morgan 1993). In 1998, using a redeveloped and expanded survey instrument, the NBCE conducted a follow-up; the report of the survey data was entitled *Job Analysis of Chiropractic 2000* and was published in that year (Christensen et al. 2000). The current report presents data from a similar survey conducted in 2003. To reduce the length of the survey form, questions assessing knowledge were not included in the current form. Surveys were mailed to 10,189 licensed chiropractors; 2,574 responded. In order to describe the prominent characteristics of chiropractors and their patients, this chapter summarizes and reports data collected in the 2003 NBCE job analysis survey; subsequent chapters contain a more complete presentation of the 2003 survey results and, where appropriate, provide comparisons to data from previous surveys.

## The "Typical" Chiropractor

According to the survey data, the typical full-time chiropractor is a Caucasian male who is in professional practice from 30 to 40 hours per week. Most chiropractors (61.8%) practice in a single-practitioner office. Typically, doctors of chiropractic also have a baccalaureate degree and participate in continuing education exceeding 21 hours per year; however, about two-thirds have not worked toward certification in a specialty area. Similar to the 1998 survey data which showed 46.6% of chiropractors had practiced 5 to 15 years, 42.3% of those in the current survey have been in practice for 5 to 15 years (Table 7.5); a weighted average of responses reveals that the average chiropractor was in practice for 13.2 years in 1998 and 15.6 years in 2003.

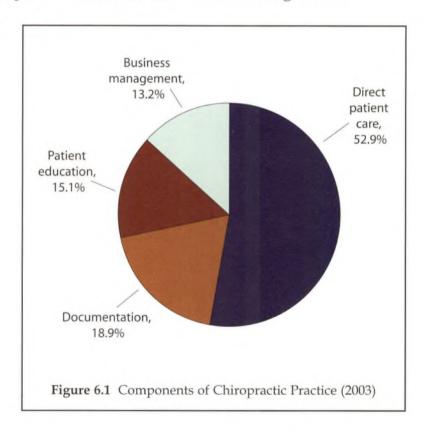
#### **Routine Activities and Procedures**

Chiropractors see patients with spinal subluxations (please refer to Chapter 1 for a definition of this term) and joint dysfunctions on a routine basis. In a typical week, chiropractors treat patients who have the following conditions: neurological problems such as headaches, radiculopathy, or neuralgia; joint problems including osteoarthritis, extremity subluxations, sprains, intervertebral disc syndrome, and facet syndrome; and muscular problems such as strained muscles, myofascitis, and tendonitis. Less frequently, chiropractors encounter patients with scoliosis, fibromyalgia, carpal tunnel syndrome, vertigo, and spinal stenosis/neurogenic

claudication. A typical month may also include patients with obesity, high blood pressure, osteoporosis, allergies, diabetes, and menstrual disorders. Viral infections, asthma or emphysema, and rheumatoid arthritis or gout (Table 6.1) are typically seen less frequently than monthly.

Chiropractors routinely obtain case histories, record progress notes, perform physical and neuromusculoskeletal examinations, and sometimes provide adjunctive care such as physiotherapy (Table 6.2; Table 10.13). They believe that there is risk to patients if these procedures are either poorly performed or omitted. Using information from the patient history, examination, and/or radiographs, chiropractors frequently arrive at a non-subluxation-based diagnosis (Table 6.2).

The typical practitioner spends just over half (52.9%) of his work time on direct patient care (Figure 6.1), down from 62% as reported in the 1991 NBCE *Survey of Chiropractic Practice*. After direct patient care, a chiropractor's practice time includes documentation, patient education, and business management.



#### **Patient Conditions**

The table below presents data from Chapter 9 of this report concerning patient conditions within a chiropractic practice. The table shows the frequency with which the tasks are performed, based on a five-point scale.

Virtually Never		Rarely (1-10/yr)		Sometimes (1-3/mo)		Often (1-2/wk)		Routinely
0	0.5	1.0	1.5	2.0	2.5	3.0	3.5	than 2/wk) 4.0

Routinely (more than 2/week)	
Spinal subluxation/joint dysfunction	3.9
Often (1-2/week)	
Headaches	3.3
Osteoarthritis/degenerative joint disease	3.3
Extremity subluxation/joint dysfunction	3.2
Sprain of any joint	3.1
Hypolordosis of cervical or lumbar spine	3.1
Muscular strain/tear	3.0
Intervertebral disc syndrome	3.0
Radiculitis or radiculopathy	2.9
Myofascitis	2.9
Vertebral facet syndrome	2.9
Peripheral neuritis, neuralgia, or neuropathy	2.8
Tendinitis/tenosynovitis	2.7
Sometimes (1-3/month)	
Hyperlordosis of cervical or lumbar spine	2.4
Kyphosis of thoracic spine	2.4
Functional scoliosis	2.2
Obesity	2.1
High blood pressure	2.1
Fibromyalgia	2.1
Bursitis or synovitis	2.1
Carpal or tarsal tunnel syndrome	2.1
Sinus condition	2.0
Osteoporosis/osteomalacia	2.0
Allergies	1.9
Structural scoliosis	1.9
TMJ syndrome	1.8
Dizziness/vertigo	1.7
Thoracic outlet syndrome	1.7
Vertigo/loss of equilibrium	1.6
Spinal stenosis/neurogenic claudication	1.6
Diabetes	1.6
Menstrual disorder/PMS	1.5
Congenital/developmental anomaly	1.5

Rarely (1-10/year)	1/19
Nutritional disorders	1.4
Upper respiratory or ear infection	1.4
Pregnancy	1.4
Menopause	1.4
Viral infection	1.4
Asthma, emphysema, or COPD	1.4
Congenital/developmental anomaly	1.4
Systemic/rheumatoid arthritis or gout	1.4
Damaged nerve/plexus	1.3
Hiatal hernia/esophageal reflux	1.3
Bacterial infection	1.2
Thyroid or parathyroid disorder	1.1
Kidney or urinary tract infection	1.0
Acne, dermatitis, or psoriasis	1.0
Muscular atrophy	1.0
ALS, multiple sclerosis, or Parkinson's	0.9
Psychological disorders	0.9
Colic	0.9
Bacterial or viral infection	0.9
Colitis or diverticulitis	0.9
Fracture	0.9
Cranial nerve disorder	0.8
Incontinence	0.8
Occupational or environmental disorder	0.8
Dislocation of any joint	0.8
Stroke or cerebrovascular condition	0.7
Eating disorders	0.7
Benign prostatic hypertrophy	0.7
Anemia	0.7
Adrenal disorder	0.7
Murmur or rhythm irregularity	0.7
Kidney stones	0.7
Bacterial or fungal infection	0.7
Ulcer of stomach, small intestine, or colon	0.7
Hemorrhoids	0.7

Table 6.1 Patient Conditions

## **Patient Conditions (Continued)**



Rarely (1-10/year)	
Female infertility	0.6
Angina or myocardial infarction	0.6
Peripheral artery or vein disorder	0.6
Herpes simplex	0.6
Herpes zoster	0.6
Skin cancer	0.6
Inguinal hernia	0.6
Immunological disorder	0.5
Vascular claudication	0.5
Endocrine or metabolic bone disorder	0.5
Bone tumor/metastasis	0.5
Virtually Never (0)	
Vertebrobasilar artery insufficiency	0.4
Impotency	0.4
Noncancerous breast disorder	0.4
Hereditary disorder	0.4
Significant ear pathology	0.4
Disorder of nose or sense of smell	0.4
Throat or larynx disorder	0.4
Pituitary disorder	0.4
Arterial aneurysm	0.4
Congenital anomaly	0.4
Pigment disorders	0.4
Cholecystitis or pancreatitis	0.4
Muscular dystrophy	0.4
Avascular necrosis	0.4

Infection of joint/disc	0.4
Brain or spinal cord tumor	0.3
Parasites	0.3
Infectious diseases (mumps, measles, chicken pox)	0.3
Male infertility	0.3
Prostatic carcinoma	0.3
Breast or reproductive system tumor	0.3
Significant eye pathology	0.3
Hepatitis B	0.3
Herpes II	0.3
HIV/AIDS	0.3
Thymus or pineal disorder	0.3
Chronic kidney disease or failure	0.3
Appendicitis	0.3
Tumor of lung or respiratory passages	0.3
Osteomyelitis/infection	0.3
Muscle tumor	0.3
Polycythemia	0.2
Marrow or lymphatic system cancer	0.2
Other sexually transmitted disease	0.2
Endocrine tumor	0.2
Kidney or bladder tumor	0.2
Tumor of gastrointestinal tract	0,2
Atelectasis or pneumothorax	0.2
Other reproductive system tumor	0.1
Eye, ear, nose, or throat tumor	0.1

Table 6.1 Patient Conditions (Continued)

## **Frequency of Professional Functions**

The table below presents data from Chapter 10 of this report concerning professional functions within a chiropractic practice. The table shows the frequency with which the tasks are performed, based on a five-point scale.

Virtually Never		Rarely (1-25%)		Sometimes (26-50%)		Frequently (51-75%)		Routinely (76-100%)
0	0.5	1.0	1.5	2.0	2.5	3.0	3.5	4.0

Routinely (76-100%)	
Obtain initial case history	4.0
Perform chiropractic adjustive techniques	4.0
Take S.O.A.P. or case progress notes	3.9
Perform physical examination procedures on a new patient	3.8
Perform specific chiropractic examination procedures	3.8
Determine appropriate case management/ technique from chiropractic examination	3.8
Identify condition from case history	3.7
Update case history	3.7
Perform general orthopedic and/or neuro- logical examination procedures on a new patient	3.7
Update chiropractic examination	3.7
Discuss treatment options with patient	3.7
Modify case management as patient's condition warrants	3.7
Perform focused case history	3.6
Determine appropriate chiropractic tech- nique/case management from case history	3.6
Determine the patient's general state of health, using the physical examination information	3.6
Perform regional physical examination procedures	3.6
Re-examine periodically or when a patient's condition changes	3.6
Evaluate patient condition to determine if other than adjustive techniques are indicated	3.6
Determine indications or contraindications for use of adjunctive care	3.6
Encourage patient to change habits/lifestyle appropriately	3.6

Maintain written record of problem(s), goals, intervention strategies, and case progress	3.6
Perform focused orthopedic and/or neuro- logical examination procedures based on preliminary clinical findings	3.5
Determine patient condition using ortho- pedic/neurological examination	3.5
Determine need for additional lab, x-ray, special study and/or referral from orthopedic and/or neurological examination	3.5
Frequently (51-75%)	
Update orthopedic/neurological tests	3.4
Distinguish between urgent/less urgent conditions from history and examination	3.4
Determine anomaly, pathology, fracture, dislocation or other significant findings from x-ray	3.3
Arrive at specific musculoskeletal diag- nosis/ impression (other than subluxation) based on examination and history findings	3.2
Monitor effectiveness of non-adjustive techniques, therapeutic procedures, and adjunctive care	3.2
Recommend/arrange for other services when condition warrants	3.2
Relate positive history and exam findings to a pathologic, pathophysiologic, or psychopathologic process	3.1
Perform procedures other than adjustive	3.0
Predict effectiveness of chiropractic care using history and examination information	3.0
Perform x-ray on new patients	2.7
Provide patients with written informed consent	2.7

Table 6.2 Frequency of Professional Functions

## Frequency of Professional Functions (Continued)



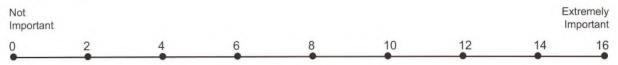
Frequently (51-75%)	
Perform new x-rays on a patient whose condition has deteriorated or is not responding	2.6
Refer to other practitioners based on examination and history information	2.6
Determine possible presence of subluxa- tion/spinal listing using x-rays	2.5
Perform new x-rays on a patient who has a new condition	2.5
Sometimes (26-50%)	7
Arrive at specific non-musculoskeletal diag- nosis/impression (other than subluxation) based on examination and history findings	2.3
Counsel patient about informed consent	2.3
Utilize chiropractic instruments	2.1
Refer patient to other non-M.D./D.C./D.O. practitioner for adjunctive therapy, based on patient condition	2.1
Determine instability/joint dysfunction from	2.0

Confirm a diagnosis or rule out health- threatening conditions using laboratory information	2.0
Augment history, examination or radio- graphic findings using information from laboratory or specialized studies	1.9
Refer patients for MRI or CT scan	1.8
Rarely (1-25%)	
Perform new x-rays to monitor a patient's progress	1.2
Refer patients for EMG/nerve conduction studies	1.1
Order laboratory tests from hospitals or private laboratory	1.0
Refer patients for bone scan	1.0
Refer patients for other specialized studies	1.0
Refer patients for EKG or vascular studies	0.8
Virtually Never	
Draw blood, collect urine, or perform labo- ratory or other specialized procedures in your office	0.3

Table 6.2 Frequency of Professional Functions (Continued)

### Importance of Professional Functions

The table below presents data from Chapter 10 of this report concerning professional functions performed within chiropractic practices. The table rank orders professional functions based on **Importance Value**. The importance value is derived by multiplying respondents' ratings of frequency and risk on five-point scales, with values from zero to four, which yields a scale from 0 (not important) to 16 (extremely important).



Professional Function	Importance
Obtain initial case history	11.9
Distinguish between urgent/less urgent conditions from history and examination	11.4
Perform physical examination procedures on a new patient	11.4
Determine anomaly, pathology, fracture, dislocation or other significant findings from x-ray	10.7
Identify condition from case history	10.5
Perform focused case history	10.2
Perform general orthopedic and/or neurological examination procedures on a new patient	10.1
Perform regional physical examination procedures	9.9
Determine need for additional lab, x-ray, special study and/or referral from orthopedic and/or neurological examination	9.8
Update case history	9.7
Determine the patient's general state of health, using the physical examination information	9.7
Determine indications or contraindications for use of adjunctive care	9.7
Perform focused orthopedic and/or neurological examination procedures based on preliminary clinical findings	9.6
Determine appropriate chiropractic technique/case management from case history	9.5
Determine patient condition using orthopedic/neurological examination	9.4
Modify case management as patient's condition warrants	9.1
Relate positive history and exam findings to a pathologic, pathophysiologic, or psycho- pathologic process	9.0
Re-examine periodically or when a patient's condition changes	9.0
Take S.O.A.P. or case progress notes	8.8
Recommend/arrange for services when condition warrants	8.7
Perform specific chiropractic examination procedures	8.7
Update orthopedic/neurological tests	8.6
Perform chiropractic adjustive techniques	8.5
Determine appropriate case management/technique from chiropractic examination	8.3
Maintain written record of problem(s), goals, intervention strategies, and case progress	8.3
Discuss treatment options with patient	8.1
Refer to other practitioners, based on history and examination information	8.0

Table 6.3 Importance of Professional Functions

## Importance of Professional Functions (Continued)



Professional Function	Importance
Arrive at specific musculoskeletal diagnosis or clinical impression (other than subluxation) based on examination and history findings	8.0
Encourage patient to change habits/lifestyle appropriately	7.8
Update chiropractic examination	7.7
Perform x-ray on new patients	7.3
Evaluate patient condition to determine if other than adjustive techniques are indicated	7.3
Perform new x-rays on a patient whose condition has deteriorated or is not responding	7.1
Monitor effectiveness of non-adjustive techniques, therapeutic procedures, and adjunctive care	6.5
Provide patient with written informed consent	6.4
Arrive at specific non-musculoskeletal diagnosis/impression (other than subluxation) based on examination and history findings	6.2
Perform new x-rays on a patient who has a new condition	6.1
Confirm a diagnosis or rule out health-threatening conditions using laboratory information	6.0
Predict effectiveness of chiropractic care using history and examination information	5.9
Perform procedures other than adjustive	5.6
Determine possible presence of subluxation/spinal listing using x-rays	5.3
Counsel patient about informed consent	5.2
Augment history, examination or radiographic findings using information from laboratory or specialized studies	5.1
Determine instability/joint dysfunction from stress x-rays	5.0
Refer patients for MRI or CT scan	4.5
Refer patient to other non-M.D./D.C./D.O. practitioner for adjunctive therapy, based on patient condition	4.1
Utilize chiropractic instruments	3.9
Refer patients for bone scan	2.6
Refer patients for other specialized studies	2.4
Refer patients for EMG/nerve conduction studies	2.4
Refer patients for EKG or vascular studies	2.3
Order laboratory tests from hospitals or private laboratory	2.3
Perform new x-rays to monitor a patient's progress	2.0
Draw blood, collect urine, or perform laboratory or other specialized procedures in your office	0.6

Table 6.3 Importance of Professional Functions

#### **Treatment Procedures**

Three-fourths (76.1%) of practitioners surveyed indicated that they utilize a "Full Spine and Extremity" approach. A typical chiropractor will use five to six different adjusting techniques in practice. Ninety-six percent of chiropractors use diversified technique, and 71.5% of patients will be treated with this technique. (Refer to Chapter 10, Tables 10.11 and 10.12).

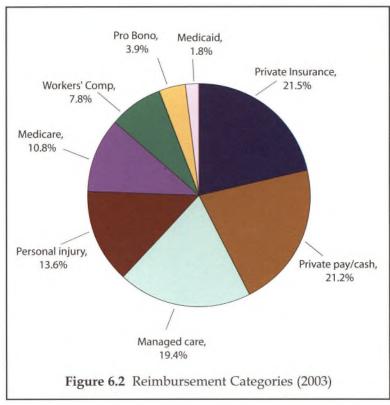
Chiropractic practitioners sometimes treat patients with ice packs and sometimes utilize trigger point therapy, electrical stimulation, hot packs, massage therapy, traction, mobilization therapy, ultrasound, and provide nutritional counseling. Many other therapies are less frequently implemented (Table 10.13).

Corrective exercises are frequently recommended, and advice about activities of daily living is frequently given to patients while rehabilitation procedures are sometimes suggested. Other active adjunctive care activities/procedures and recommendations including foot orthotics, work hardening and a formal back school program are sometimes a part of patient care (Table 10.14).

#### Reimbursement Categories, Managed Care, and Referral

Generally, one-fifth (21.2%) of chiropractic patients pay cash for services, one-fifth (21.5%) are covered by private (nonmanaged care) insurance, and another one-fifth (19.4%) are covered through managed care contracts. The remaining 34% of reimbursement funds are divided among personal injury, Medicare, Workers' Compensation, and Medicaid. Pro bono services account for 3.9% of services (Figure 6.2).

Seventy-three percent (73.1%) of practitioners are involved in managed care Referral programs. patients between chiropractors and other health care practitioners does occur, and the typical of chiropractic doctor makes 12.9 referrals per month and receives about 7.4 referrals per month (Figure 7.11).



### The "Typical" Patient

The typical chiropractic patient is characterized as an 18- to 64-year-old (Figures 6.3 and 6.4), 60% of whom are female. However, chiropractors are managing young patients more frequently; the percentage of patients under 17 years of age has

increased 8.5% since the 1991 survey. Patients' most frequent chief complaints concern low-back and neck problems; other common complaints are headache or facial pain and mid-back pain/injury (Figure 6.5). Eight percent of chiropractic patients seek wellness care. One-fifth (20.9%) of patients' problems arise from activities of daily living; the next two most common causes of complaints patient are overuse/repetitive stress (15.2%) and motor vehicle accidents (14.3%) (Figure 6.6).

