

EDITORIAL

History of Sports Medicine and Successful Career in Orthopedic Sports Medicine

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Understanding the historical trajectory of sports medicine is crucial for professionals in the field, guiding future advancements and improvements. From ancient Greece to modern times, sports medicine has continually evolved, adapting to new challenges and technologies.

Herodicus, known as the 'Father of Sports Medicine,' introduced fundamental theories on therapeutic exercises in the 5th century B.C. Since then, sports medicine has undergone numerous developments, addressing the inevitable injuries associated with athletic competition.

In the United States, modern sports medicine traces back to 1890 at Harvard Medical School, where educational programs emphasized personal fitness, injury treatment, and rehabilitation. The establishment of professional organizations like the American Orthopedic Society of Sports Medicine (AOSSM) in 1972 and the Arthroscopy Association of North America (AANA) in 1981 further propelled advancements in the field.

Technological innovations, such as the arthroscope, revolutionized orthopedic surgery, while fellowship programs provided specialized training opportunities. Collaborations among various sports societies expanded sports medicine globally, reaching regions like Europe, Asia, and South America.

The multidisciplinary nature of sports medicine involves various medical disciplines working together to prioritize athletes' health and well-being. Successful team physicians exhibit attributes like availability, compassion, and effective communication, fostering positive outcomes for athletes.

Excellence in orthopedics extends beyond clinical expertise, encompassing patient care, research, education, leadership, and personal development. Prioritizing patient care, ethical conduct, and research integration are fundamental for success.

Continuous learning, mentorship, and effective leadership are essential components of orthopedic

careers. Setting clear goals, cultivating positivity, practicing humility, fostering compassion, expressing appreciation, embracing persistence, and maintaining a healthy lifestyle are key principles for achieving success.

In conclusion, orthopedic practitioners should embrace self-analysis and self-criticism, tempered by patience and urgency, to navigate their careers successfully.

The Importance of Sports Medicine History

Understanding the historical trajectory of sports medicine is crucial for professionals in the field. Just as in any discipline, knowing the origins and evolution of practices helps guide future advancements and improvements. From ancient Greece to modern times, sports medicine has continually evolved, adapting to new challenges and technologies.

As history dictates, if you don't know where you've been, you certainly don't know where you're going!

Herodicus was the first team physician, athletic trainer, and the original "Father of Sports Medicine." He was a Thracian physician of the 5th century B.C. who rendered his fundamental theories on the use of therapeutic exercises for the maintenance of health and treatment of disease. Reportedly, Hippocrates' father sent him to the Isle of Creek to study sports medicine from Herodicus.¹

Since then, there has been an abundance of sports medicine theories and practices with many inconsistencies. Throughout history, athletic competition has inevitably led to injuries which can be severe, career-ending, and even deadly, highlighting the necessity of sports medicine.

Early Developments in Sports Medicine

In the United States, the roots of modern sports medicine can be traced back to 1890 at Harvard Medical School. Recognizing the prevalence of sports-related injuries, Harvard implemented educational programs emphasizing personal fitness, proper gear usage, injury treatment, and rehabilitation.

The establishment of team athletic trainers and therapists

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alongside team physicians underscored the growing importance of sports medicine in supporting athletes' health and performance.

Formative Years and Professional Organizations

The 1940s and 50s witnessed a surge in scientific research, laying the foundation for contemporary sports medicine practices. The publication of numerous scientific articles in the United States initiated the scientific basis for sports medicine as it is known today. The establishment of the American Orthopedic Society of Sports Medicine (AOSSM) in 1972 marked a significant milestone, elevating sports medicine as an orthopedic subspecialty in North America. The inaugural meeting was held in conjunction with the AAOS's annual meeting in Washington, DC, where Dr. Don O'Donoghue was elected as the first president of AOSSM. Concurrently, the establishment of The Journal of Sports Medicine, later known as the American Journal of Sports Medicine, with Dr. Jack Hughston as its initial editor, provided a platform for disseminating research and advancements in the field.²

Technological Advancements and Global Expansion

The introduction of the arthroscope in the 1960s revolutionized orthopedic surgery, particularly in procedures like ACL reconstruction and other ligamentous surgeries. The Arthroscopy Association of North America (AANA), founded in 1981, further propelled innovations in minimally invasive surgical techniques.

Sports medicine fellowship programs emerged in the early 1970s, offering specialized training, individually organized apprenticeships, and one-on-one experiences. Dr. Hughston and Dr. Andrews established the very first sports medicine fellowships in the US.

Other sports societies, including the American College of Sports Medicine, the National Athletic Trainers' Association (NATA) and its athletic trainers, the sports section of the American Physical Therapy Association, the American Medical Society of Sports Medicine, and the Association of Strength and Conditioning Coaches, played significant leadership roles in the development of sports medicine. Notably, the collaboration among these organizations laid the foundation for the modern Sports Medicine team. As a result, sports medicine began to expand globally, reaching regions such as Europe, Asia, and South America, particularly Brazil.

The Multidisciplinary Approach in Sports Medicine

Whatever it is, it's a "team effort!"

Sports Medicine encompasses a diverse number of medical disciplines, including, but not limited to, sports medicine doctors, sports medicine orthopedists, athletic trainers, physical therapists, sports chiropractors, podiatrists, nutritionists, and sports psychologists, mental health specialists, along with EMTs and also bio-engineers and the bio-mechanist.

The sports medicine team prioritizes the player's health and well-being, followed by effective communication and collaboration with parents, teams, coaches, and management.

In sports medicine and orthopedic practice, the role of a team physician is not merely a professional obligation but

often evolves into a passionate commitment, almost akin to a full-time hobby when executed with dedication. The motivations behind this commitment are manifold:

Community Involvement and Interest: Engaging with athletes and sports teams fosters a sense of community involvement and interest, aligning with the physician's passion for sports and well-being.

Intrinsic Enjoyment and Altruism: Many practitioners find joy and fulfillment in serving athletes and contributing to their health and performance. Moreover, it's seen as the right thing to do, driven by a sense of altruism and the desire to make a positive impact.

Voluntary Expectation: In most cases, serving as a team physician is an expectation that arises voluntarily, reflecting a dedication to the athletes and their sporting endeavors.

A hallmark of a good team physician, exemplified by renowned figures like Dr. Hughston, encompasses several attributes, including, availability, compassion, gentleness, honesty and communication, and a sincere commitment to supporting athletes' well-being, coupled with a love for promoting good sportsmanship, underpins the physician's role.

Excellence in Orthopedics

Excellence in orthopedics extends beyond clinical expertise; it requires a holistic approach encompassing patient care, research, education, leadership, and personal development.

Prioritizing Patient Care and Ethical Conduct

Central to excellence is prioritizing patient care, with a focus on accessibility, availability, and effective communication to address their needs comprehensively. Prioritizing patients and their families ensures a patient-centric approach, guided by the adage, 'If mothers aren't happy, nobody's happy.'³

Andrew's patient philosophy at Andrews Institute

- Always be open-minded.
- Do not be the first person to make the big statement.
- The patient is always right.
- Make the patients feel they are treated properly by their previous physician.
- Do not say anything bad about another physician, for that matter, another person.
- Listen to the patient.
- Attitude, responsibility, knowledge, desire, and availability are always necessary to be successful.
- One must always be able to read the patient, particularly in today's electronic world.
- The physician must be confident with his skills. His confidence is reflected back and perceived by the patient.
- Try to make every patient feel as though they're special.
- Don't compromise what you do best as a routine or try to do something extra special beyond your norm in any endeavor in life. "Don't get fancy" and stick with your routine.

The indications for non-operative conservative treatment versus surgical intervention in orthopedic cases involve various patient behaviors and expressions, such as desperation "you're my last hope", unusual sensitivity to light, claims of high pain tolerance, and emotional distress.

These signs suggest complex patient relationships and potential psychological factors influencing their treatment. As such, a careful approach is essential, emphasizing conservative treatments initially and considering surgery only after thorough assessment and consideration of the patient's overall condition.

At the core of the medical profession lies the commitment to prioritize patient well-being. The physician-patient relationship is central to all ethical considerations, emphasizing the importance of honesty, trust and confidentiality. Orthopedic professionals are entrusted with providing competent medical services characterized by compassion and respect for patients' needs and preferences. Success in orthopedics necessitates proficiency in medical economics. However, it's imperative to prioritize patient care over financial considerations. Economic factors should never compromise the delivery of optimal medical treatment.

Embracing Research in Orthopedic Surgery

Research is an essential component of excellence in orthopedic surgery, driving innovation, fostering critical thinking, and enhancing clinical practice. There is a growing appreciation that researchers often make better clinicians. Some of the reasons that why research is pivotal, include:

- Researchers often demonstrate a deeper understanding of clinical medicine, enriching their practice and patient care.
- Engaging in research fosters critical thinking and appraisal skills, enabling practitioners to evaluate and implement evidence-based practices.
- Research contributes to the advancement of specialized clinical applications and enhances teamwork skills among healthcare professionals.
- Participation in research exposes practitioners to the insights and expertise of leading clinical minds, fostering professional growth and development.

It's imperative to leverage research as a source of inspiration and innovation throughout one's medical career. Delaying engagement in research can limit opportunities for professional advancement and hinder the integration of cutting-edge practices into patient care. Clinical and preclinical research has consistently served as the cornerstone of success in orthopedics and across various medical fields. A fulfilling orthopedic career in the 21st century is a career of lifelong learning. By embracing a culture of lifelong learning and research, orthopedic practitioners can shape the future of orthopedic care and make meaningful contributions to medical knowledge.

Continual Learning and Mentorship in Orthopedics

Ongoing education is crucial for orthopedic practitioners to stay updated on the latest advancements and best practices, enhancing patient outcomes. The field of medicine, particularly orthopedics, evolves rapidly, and failing to keep pace can lead to falling behind in knowledge and practice. It is crucial to regularly engage with current research articles and participate in relevant scientific meetings to remain informed and proficient in clinical practice.⁴
Serfdom by F.A. Hayek.

Life is a process of becoming; it's not really a destination. When we stop growing, developing, and reaching out, we begin to die gradually.

Honor your Mentors

Mentorship also plays a vital role in the professional development of orthopedic practitioners. Acknowledging and honoring the guidance and wisdom imparted by mentors is essential for continued growth and success. Reflecting on the contributions of mentors fosters humility and gratitude, reminding practitioners of the collaborative efforts that have shaped their careers. I am grateful for the guidance of three distinguished mentors, Professor Albert Trillat, a king of knee surgery from Lyon, France, Dr. Jack Hughston, a king of sports medicine in the US, and Dr. Frank McCue, the Chief of Orthopedic Sports Medicine at the University of Virginia.

Leadership and the Path to Success

Effective leadership involves providing inspiration, empowering others, fostering collaboration, and advocating for positive change. Despite challenges in leadership development within medical training programs, cultivating a proactive mindset and collaborative approach can drive systemic improvements.

Why do physicians often struggle to become effective leaders?

Traditional medical training programs primarily focus on diagnosing and treating patients rather than developing leadership skills. As a result, physicians may feel ill-equipped to lead multidisciplinary medical teams effectively.

Many physicians receive minimal or no formal training in leadership, lacking essential knowledge of business models and organizational management. The emphasis on patient care may overshadow the importance of leadership development.

There's a tendency to perceive directors and administrators negatively, labeling them as "bean counters" or "pencil pushers." This attitude can create a divide between clinicians and administrators, hindering effective collaboration and leadership development.

It's essential for physicians to recognize their role in fostering teamwork and finding solutions to challenges within the healthcare system. Rather than succumbing to frustration or apathy, physicians should actively participate in improving the system's functionality.

As leaders, physicians must strive to make the healthcare system functional by embracing collaboration, communication, and proactive problem-solving. It's crucial to move beyond individual complaints and work collectively towards positive change for the benefit of patients and healthcare professionals alike.

Success in your orthopedic careers

"A man does not, and cannot know everything ... and if he acts like he does, disaster ultimately follows." A Road to

Fame and wealth without wisdom are unsafe possessions;

Democritus.

When you're green, you're growing, and when you're ripe, you're next to you know what; Dr. Hughston.

Achieving success in orthopedic careers requires a multifaceted approach and a mindset geared towards continuous improvement.⁵

Here are key insights:

Defining Success: Success should not solely be measured by fame or wealth, but rather by personal fulfillment and professional growth.

Setting Goals: Establish clear and achievable goals, both short-term and long-term, and take personal responsibility for motivating yourself to achieve them.

Prioritizing: Recognize the importance of balancing professional aspirations with personal values and relationships, placing faith, family, and profession in order of priority.

Cultivating Positivity: Maintain a positive outlook and strive for a ratio of positive to negative thoughts, as negativity can hinder progress and productivity. Leading a positive life is powerful!

Practicing Humility: Humility fosters greatness by promoting active listening, collaboration, and a willingness to share credit with others.

A person is destined to do great things if he does not care who gets the credit. - General George Marshall, WWII Army Chief of Staff and a Nobel Peace Prize winner.

Humility is not thinking less of yourself, it is thinking of yourself less; Rick Warren.

A burning desire: Next on my list, is the development of "a burning desire". In other words, do not be content When I select fellows for our orthopedic sports medicine fellowship, one of the key ingredients I look for in our candidates is a burning desire, which overshadows all of their previous accomplishments. I would also recommend that you keep a journal of a diary of all your successes.

Besure to write down all your goals, do not just think them.

Fostering Compassion: Develop empathy and compassion towards patients and colleagues, recognizing that caring for others is fundamental to success in the medical field. People want to know how much you care, before they care how much you know.

Compassion is something you need to work on.

I recommend giving, that in your practice, you develop the

habit of giving something away free every workday!

Expressing Appreciation: Show gratitude and appreciation for the contributions of those around you, as acknowledgment and encouragement can be powerful motivators.

Embracing Persistence: Persevere in the face of challenges and setbacks, recognizing that persistence is essential for unlocking opportunities and achieving success, Never give up, There is no substitute for maximum effort.

Handling Failure: Learn from failures and mistakes without dwelling on them, understanding that resilience and self-forgiveness are crucial for personal growth and development. Life is full of memories, some good and some bad. Remember the ones that made you happy, and learn from the ones that made you sad; Bo Bahnsen.

Ego: Ego refers to an individual's self-esteem or self-confidence, which is crucial for success. While possessing ego is acceptable and even beneficial, it is imperative to remain humble and honest. Avoid cultivating a false or inflated ego, as this could lead to becoming an egomaniac, which is highly undesirable.

Maintaining a Healthy Lifestyle: Prioritize your physical and mental well-being, recognizing that personal health is essential for sustaining long-term success and productivity. The body is the most fascinating machine ever created. Remember you are not "Bullet proof".

Finally, incorporate "injury prevention" into your orthopedic world, especially regarding YOUTH SPORTS.

I am often asked about the best advice I ever was given for my orthopedic career, and it came from my wife Jenelle, When she said, remember:

"If you're still talking about what you did yesterday, you're not doing much today."

Always take time to give credit to your spouse, it is a journey for both of you.

In conclusion, as you establish your orthopedic careers, use self-analysis and self-criticism to guide you. Be tempered by nature, i.e. be patient.

"Be patient, but do it in a hurry", that is typical of orthopedic surgery.

Remember that the hardest thing to accomplish after success is maintaining success!

"Good luck"

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