

Fortieth Annual Conference and Scientific Assembly of the Islamic Medical Association of North America (IMANA)

**A jointly sponsored CME Conference through
the Dodge County Medical Society of Wisconsin**



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Dodge County Medical Society of Wisconsin for CME designates this educational activity for a maximum of fifteen (15) hours in category 1 credit towards the AMA Physician's Recognition Award. Each physician should claim only those hours of credit that he/she actually spent in the educational activity.

Abstracts

1 Obesity, Cardiac and Pulmonary Diseases, and Leptin

*Abida Haque, MD
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Objective: Obesity is associated with sleep disordered breathing and cardiovascular morbidity, but the relationship between pulmonary hypertension, heart disease, and obesity is unknown. The obese gene (*ob*) protein product leptin is a hormone secreted by adipocytes and functions to suppress appetite and increase energy expenditure. Hyperleptinemia is an essential feature of obesity. A role of leptin in hematopoiesis, angiogenesis, immune function, osteogenesis, and wound healing has also been documented. There are only a few studies of cardiovascular and pulmonary diseases associated with obesity.

Design: We performed a study to determine the prevalence of pulmonary and cardiovascular disease in obese subjects undergoing autopsy at a large medical center.

Material and Methods: A search through autopsy records from a 10-year period identified 76 subjects with a body mass index (BMI) >30 kg/m², and 46 age-matched, nonobese controls randomly selected during the same period. Clinical data were collected from medical charts and autopsy records. Formalin fixed, paraffin-embedded sections of the lungs and heart were reviewed for each subject. The presence of pulmonary edema, hemorrhage, diffuse alveolar damage, thrombi, pulmonary hypertensive changes, alveolar capillary hemangiomatosis, hemosiderosis, and iron encrustation were documented. Hearts were examined for the presence of cardiomegaly, ventricular hypertrophy, coronary artery atherosclerosis, acute infarction, fibrosis, and inflammation. Differences between the obese and control group were compared using a statistical software program.

Results: The obese group demonstrated a greater occurrence of diabetes, systemic hypertension, pulmonary edema, hemorrhage, and pulmonary hyper-

tensive changes (75%), compared to the control group. Alveolar capillary hemangiomatosis was exclusively observed in the obese subjects. Cardiomegaly and left ventricular hypertrophy was present in all obese subjects, however one-third of the obese subjects were free of coronary atherosclerosis.

Conclusions: Pulmonary hypertension was observed in the majority, and cardiomegaly in all obese subjects. Cardiomegaly most likely indicates obesity cardiomyopathy. Leptin is an attractive candidate for the treatment of obesity, and new anti-obesity drugs are being developed using recombinant human leptin.

2 Endoscopic Ablation of Barrett's Esophagus Using the Halo System

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Daily symptoms of gastroesophageal reflux disease (GERD) affect 18.6 million U.S. adults, of whom 12% have Barrett's intestinal metaplasia. Of those over 40 years old, 6.8% have Barrett's esophagus, and 25% of people over age 50 without GERD have Barrett's esophagus.

Barrett's esophagus is a precancerous disease. Most of the patients have nondysplastic intestinal metaplasia (83%). Some of them have low-grade dysplasia (LGD; 7.3%), and 3% of them have high-grade dysplasia (HGD), and 6.7% develop invasive adenocarcinoma. The risk of progression of nondysplastic metaplasia to LGD and HGD and adenocarcinoma is 4.3%, 0.9%, and 0.5% over a period of 1 year and 16.1%, 3.6%, and 2% over a period of 4 years.

At this time the standard treatment for patients with nondysplastic intestinal metaplasia is surveillance endoscopy every 1-3 years and every 6 months to one year for LGD. High-grade dysplasia is treated in the same manner as invasive adenocarcinoma with esophagectomy.

Recently, the concept of ablation of Barrett's mucosa has evolved to prevent its progression to

LGD, HGD, and, ultimately, adenocarcinoma. Ablation implies destruction and, ultimately, removal of Barrett's mucosa. The underlying mechanism consists of heating the tissue to the point of vaporization and/or coagulation. The endpoint is irreversible cell injury and then cell death.

Our gastroenterology department has been doing ablation of the Barrett's mucosa using the Halo System developed by Baarx Medical. I will present the technique, the experience at our department, and other centers' experiences with this procedure. In addition, I will present the outcome of the patients treated with this nonsurgical endoscopic procedure, which so far involves frequent surveillance endoscopies and major surgery once a patient develops adenocarcinoma or HGD.

3 Can Eating Behavior Disorder be Modified with Proximal Gastric Electric Stimulation?

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Introduction: Morbid obesity has become the third largest killer in the United States. Its treatment costs \$39 billion, and another \$38 billion is spent for weight reduction annually.

Objective: The aim of our device is to depress the appetite by electric stimulation via gastric fundus (proximal-afferent) stomach in deference to the earlier attempts of distal (efferent) stomach stimulation, which has not been very effective either in the United States or in Europe.

Methodology: Our research has supported our hypothesis that the afferent vagal stimuli from the stretch receptors of the fundus of the stomach via the nucleus tactus solitarius are relayed to the medial nucleus of the satiety center in the hypothalamus, which in turn depresses the lateral nucleus of the appetite center, thus turning off the appetite, achieving the state of satiety. Normally, when an empty stomach is filled with solids, fluids, and air, gas rises and distends and stretches the dome of the stomach (fundus), sending the message "I am full" to the hypothalamus satiety center. Electric stimulation sends the volley of electric pulses that arise by distension of fundus without having any significant

amount of food, fluid, or air. Repetition of the stimuli at each feeding can change the eating behavior as Pavlov showed in 1911 by establishment of reflex conditioning.

Results: Our preliminary results in a canine model have given us impressive results. The hungry dog turns away from food with pacemaker stimulation of the fundic leads consistently and repeatedly. However, further research is required to prove the validity of our hypothesis.

Future Direction: In the past four decades, it has become evident that every surgical procedure or diet/exercise regimen can have lasting success only if the subjects change their eating behavior. In the near future we may have minimally invasive laparoscopic placement of the leads on the fundus of the stomach and placement of a sophisticated Pacemaker-Z-Receiver in a muscle or under the skin, which would be amenable to programming for timing, periodicity, and amperage, etc. of delivered electric stimuli according to the specific eating behavior of the subjects, by a radiofrequency wave RFVApplier. If our hypothesis holds true in further laboratory and clinical trials, we could achieve successful eating behavior modification with long-term weight loss results, less invasively, and with less cost in lives and expense.

4 Hair Today, Gone Tomorrow

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Objective: Although hair loss can be both a devastating challenge to patients from an aesthetic viewpoint, psychosocial implications can cause social challenges for both men and women. Recognizing the underlying cause of the patient's hair loss and estimating the effect that time will have on the hair loss process is a complex and often times challenging form of aesthetic identification and treatment.

Design: Many different techniques are available for harvesting hair follicles; each technique has advantages and disadvantages. Regardless of which harvesting technique is used, the principle of protected hair follicles remains paramount. It is well known that some hairs are not lost to androgenic

alopecia. Usually, the protected follicles are found in the posterior and temporal scalp. It is important to use only the transplant follicles that will allow for the best and longest pattern of survival.

Materials and Methods: Reviewing the medical literature and microsurgical treatment schedule that I use in my practice to identify and treat both medical and surgical patients.

Results: This review is to enable the physician to have a working knowledge base of alopecia types, identification of medical causes, treatments, and surgical treatment options.

Conclusions: Most modern hair transplants result in excellent hair growth within several months after the micrografting hair transplantation. Often, however, more than one treatment session is needed to create the best-looking results.

5 Diabetes Mellitus and Coronary Heart Disease in the U.S. and Asian-American Population

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There are nearly 23 million known patients with diabetes mellitus in the United States and another 15 million cases of metabolic syndrome. The population of Asian-Americans is growing fast in the United States. A high prevalence of macrovascular disease (coronary artery disease and peripheral vascular disease) has led to high mortality and morbidity. In this paper, metabolic and cardiovascular consequences of hyperglycemia and hyperlipidemia are presented. Diagnostic criteria for metabolic syndrome, current research studies, and treatment options also are discussed.

6 Use of Immunomodulating Therapy for Common Dermatologic Conditions

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Many dermatologic conditions are due to inflammation in the skin; therefore, anti-inflammatory or immunosuppressive therapies are used. Topical and oral steroids have been used for decades to treat common skin disorders such as atopic dermatitis, allergic contact dermatitis, seborrheic dermatitis, and psoriasis. Newer agents have emerged to treat these conditions, including calcineurin inhibitors and biologic therapy with antitumor necrosis factor medications. A synopsis of common dermatologic conditions and newer immunomodulating therapies for these conditions will be discussed.

7 17 Alpha-Hydroxyprogesterone Caproate and Preterm Delivery

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Objectives:

1. Review the incidence of recurrent preterm birth.
2. Discuss the pharmacology and clinical use of 17 alpha-hydroxyprogesterone caproate (17P).
3. Review current published research and the American College of Obstetricians and Gynecologists (ACOG) Committee Opinion relative to the use of 17P to reduce preterm birth.
4. Discuss appropriate candidates for 17P therapy and options of routine patient administration.

Preterm delivery (PTD) is still a major health problem. Twelve percent of deliveries in the United States occur preterm (<37 completed weeks). Preterm neonates constitute the majority of admissions to neonatal intensive care units. They have high morbidity and mortality, and the cost of care both in the neonatal period and later on is staggering. A major objective of prenatal care is to reduce PTD rates. Recently, the use of 17P has been advocated to reduce PTD. It has been used in women who had a history of prior preterm birth. In such patients the PGD rate is reduced by about one-third. There is no commercial prescription available at this time for 17P. However, it has been compounded by several pharmacies, but most of these compounded products

have not undergone rigorous clinical testing for either safety or efficiency. In addition, its administration is by weekly, intramuscular injections, which may increase noncompliance. MATRIA Healthcare (a private healthcare provider company) is providing a program for administering 17P to patients at risk when requested by treating physician. In this presentation, I will discuss the studies that support 17P use, its clinical uses and results, potential side effects, and then briefly describe the MATRIA program for providing 17P.

This presentation is supported by a grant from MATRIA to IMANA.

8

Identification of a Novel Valosin-Containing Protein Polymorphism in Late-Onset Alzheimer's Disease

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Alzheimer's disease (AD) is the most common cause of dementia, affecting more than 18 million people worldwide. It is a progressive neurodegenerative disorder that affects memory, thinking, behavior, and emotion due to the excess accumulation and reduced clearance of amyloid plaques and neurofibrillary tangles in brain tissue. Current studies suggest that valosin-containing protein (VCP) has an important function in the ubiquitin proteasome system of nuclear inclusions in the cortex of AD patients. Valosin-containing protein is a hexameric AAA-ATPase protein required for the export of misfolded ER proteins into the cytosol and is also associated with the cell cycle and DNA damage response. Valosin-containing protein maps to 9p21.1-p12, which is within our peak region for familial late onset dementia on chromosome 9. Thus, VCP makes a reasonable candidate for late onset AD (LOAD), both in terms of its genomic location and function. In 2004 Watts et. al found several VCP mutations in a rare form of dementia, inclusion body myopathy associated with Paget disease of frontotemporal

dementia, which is within a region that has been linked to LOAD. In this study, we investigated whether variation within VCP could account for the LOAD linkage peak on chromosome 9. Sequencing was done on 188 individuals from the set of sibling pairs used to obtain the linkage results for chromosome 9 to look for novel polymorphisms that could explain the linkage signal. Any variant that was found was then typed in two additional sets of neuropathologically confirmed samples to look for associations with Alzheimer's disease. Two variants were identified. One was a novel rare variant (R92H), and the other is already reported within the publicly available databases (rs10972300). Neither explained the chromosome 9 linkage signal for LOAD. We have found a novel rare variant within the VCP gene, but did not find a variant that could explain the linkage signal for LOAD on chromosome 9.

9

Antiarrhythmic Device Therapy

Asma Syed, MD

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Arrhythmia Services

Brookdale Hospital Medical Center

Assistant Professor of Medicine

SUNY Health Science Center

Brooklyn, New York

Objectives:

1. To discuss the prevalence of sudden cardiac death.
2. To discuss the benefits and indications of defibrillator therapy.
3. To increase awareness of sudden cardiac death in heart failure patients.
4. To discuss landmark trials used to formulate guidelines for ICD implantation.

The leading cause of mortality in the United States is sudden cardiac death. Usually initiated when ventricular tachycardia/ventricular fibrillation occurs (VT/VF), which progresses to death. There are 4-5 million people in the United States with chronic heart failure. The first implantation of an ICD in a human occurred on Feb. 4, 1980.

In this presentation, I will discuss the historic milestones of ICD development, as well as the landmark trials MADIT II, SCD-HeFT, and COMPANION.

It is estimated that only 20-25% of eligible patients are receiving the devices.

Conclusion: ICDs prevent sudden cardiac death in heart failure patients. One should follow ACC/AHA guidelines for implants and need to consider each patient individually for an ICD implant.

10 The Role of Incretin- and GLP-Based Therapies in the Management of Diabetes Mellitus

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New information about the physiological roles of incretins, glucagon, glucagon-like polypeptides (GLPs), and gastric inhibitory polypeptides (GIPs) has led to a newer understanding in the pathophysiology of diabetes mellitus. This also has led to defining the role of dipeptidyl peptidase-4 (DPP-4) enzyme in degrading GLP-1. These findings led to the development of GLP-1-based therapies, such as Byetta (exenatide) and Symlin (pramlintide), as well as DPP-4 inhibitors such as Januvia (sitagliptin) and Galvus (vildagliptin). Their effects, side effects, and usefulness in the treatment of diabetes are discussed along with case studies.

11 Gender Relations in the Patient-Doctor Relationship: A Study of Judaism, Catholicism, and Islam

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Objectives:

1. Present an overview of the ethical constructs of Judaism, Catholicism, and Islam through the sacred law structure.
2. Examine each faith's teachings pertaining to gender relations.
3. Analyze the applicability of these teachings to the clinical realm in three areas: dress code, seclusion, and physical contact.

4. Present clinical practice guidelines based upon these teachings that aim to elicit and respond to the needs of patients within a multicultural practice.

Multiculturalism and its associated plurality of value systems are rapidly becoming the norm within modern medical practice. Today's clinician encounters patients from a variety of socioeconomic, cultural, and religious backgrounds within the course of a day. Therefore, he or she must negotiate multiple barriers in order to provide sensitive care. The different meanings attached to the clinical encounter by each party may lead to ethical conflicts, and in order to find amicable solutions each party needs to understand the moral codes and ethical constructs that form each other's opinion. Hence, ethical and cultural competency as well as cross-cultural communication skills are vital in clinical practice and should receive greater emphasis during physician training in order to provide for culturally sensitive care.

Gender relations, roles, and boundaries are culture-specific and have almost universally been shaped by religious teachings. The aim of this paper is to analyze gender relations in the context of the patient-doctor relationship through the eyes of Judaism, Catholicism, and Islam.

The analysis will begin with a brief overview of the sacred law and religious ethics of Judaism, Catholicism, and Islam with a special emphasis given to medical ethics. Specifically, we will examine Jewish Halacha, Canon Law, and Islamic Sharī'a and their sources. Next, the religious teachings of each of these faiths pertaining to gender relations in the social sphere will be examined by means of their sacred law structure. The analysis will focus on three areas that bear clinical relevance: dress code, seclusion of unrelated or unmarried members of the opposite sex, and physical contact. Applying the subsequent rulings and guidelines to the clinical encounter will allow for a more thorough examination of the legal discourse as well as the exemption that might exist in this context.

At the end of this reflection, we will conclude with recommendations for the clinical encounter that are attuned to the cultural sensitivities of cross-gender interaction. Rather than detail the "dos and don'ts" when encountering a patient with these religious backgrounds, our aim will be to encourage clinical practice guidelines that aim to elicit,

empathize with, and respond to the needs of patients within a multicultural practice.

12 Nephrogenic Systemic Fibrosis

Abdul Rauf Mir, MD
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Medical Director
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Objectives:

1. To understand the newly described, very rare, but potentially devastating and fatal disease entity of a nephrogenic systemic fibrosis (NSF).
2. To describe the role of Gd-based contrast agents in NSF.
3. To describe the steps necessary to avoid/prevent the occurrence of NSF.

Nephrogenic systemic fibrosis, also known as nephrogenic fibrosing dermopathy (NFD), is a new, very rare, but serious side effect linked to gadolinium (Gd)-based contrast agents for magnetic resonance imaging (MRI).

With more than 145 million administrations worldwide since they first were launched in 1988, the Gd-based contrast agents have a remarkable safety profile. Though NSF was first documented in medical literature in 2000, the first case actually dates to 1997.

Fibrosis of the skin and involvement of various organs in patients with advanced renal failure are the hallmarks of this entity.

Progressive disease with contractures and involvement of various organs often prove fatal. Etiology is not yet totally clear, and specific therapy remains to be elucidated.

Pathogenesis, clinical manifestations, diagnosis, course, prevention, and possible treatment will be discussed.

Besides nephrologists and radiologists, all physicians caring for patients with abnormal renal function need to familiarize themselves with this rare entity.

13 Do Pharmaceutical Companies' Advertisements Improperly Influence Providers' Prescribing Habits?

Sheik N. Hassan, MD
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Objectives:

1. List types of advertisements by pharmaceutical companies.
2. Identify patterns where advertisements may improperly influence physicians' prescribing habits.
3. Evaluate the impact of direct-to-consumers advertisements.

The pharmaceutical industry is an essential major component of health care. The companies that constitute this industry develop new drugs through research and also provide educational support to medical schools, hospitals, researchers, and health care providers. The companies also invest heavily in advertising their products to health care providers and the public. These advertisements take several forms. Do they have the potential to influence providers in their prescribing habits in a manner that may not be in the best interest of patients? This presentation will provide information on patterns of advertisements that should help physicians avoid bias in prescribing medicines.

14 Early Human Development as Described in the Qur'an and Seen by Sonography

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Clinical Professor
Medical College of Georgia
Augusta, Georgia

Objectives:

1. Describe the development of the human embryo as revealed by sonography.
2. Compare sonographic with embryologic pictures of the developing human embryo.
3. Relate these to the Qur'anic verses dealing with human creation.

The Qur'an describes in very concise but miracu-

lously accurate language the early stages of human development. Embryologists have examined these steps in aborted material. Their descriptions attest to the accuracy of the Qur'anic description.

The use of ultrasonography allowed us to see this development in live embryos and fetuses.

In this presentation I will show sonographic pictures of the developing human embryo along with photographs of embryos, while quoting some of the pertinent Qur'anic verses.

15 Towards Effective Patient-Physician Relationship: Our Communication Skills Course Experience

AH Al-Amri, Ibrahim Al-Hoqail, Mohammad Alrukban, Kheder Al-Zahrani, Abdulaziz Al-Kabba, Sarah Al-Ghamdi, Elsyed Elzyat, and Aiman Zaher, MD

Background: Many researchers have extensively demonstrated that effective communication between the doctor and the patient has a positive effect on the clinical outcome as well as on the satisfaction of both sides. Our experiences, as well as many other medical centers, have reported serious problems in the patient-physician relationship, especially in consultation skills. However, there is limited published information about teaching and training of consultation skills. Therefore, the consultation skills course is included as an essential component in the King Fahad Medical City Faculty of Medicine (KFMC-FOM) curriculum. Here we share our curriculum and experience in this important topic.

Objectives:

1. To describe our progressive consultation skills curriculum.
2. To explain the development of our medical student consultation skills score.
3. To describe our consultation skills assessment methods.
4. To report the outcome of this innovative course.

The setting was the faculty of medicine at KFMC, Riyadh, Kingdom of Saudi Arabia.

The participants were medical school students at KFMC.

Design: We have developed and implemented the consultation skills program in two years. During

the course, the students were expected to accomplish the following:

- Recognize the effects of good communication on the outcome of the consultation.
- Provide active participation through experiential learning methods.
- Practice different types of consultation models in different settings.

In each session, students were taught to achieve competency in all the chosen set of skills before moving to the next session. The consultation skills are assessed by summative and formative ways.

Results: The advantage of adopting the self-made assessment is that it provides a greater motivation for the students. The limitation is that it requires more time and effort.

Conclusion: KFMC-FOM consultation skills course is a preclinical training that provides active participants progressive competency. It significantly improves their patient-physician relationship skills throughout their career.

16 Selected Topics in Clinical Genetics

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Purpose: To discuss selected topics in clinical genetics.

Design: Background information with illustrative case histories to emphasize pertinent concepts.

Methods: Retrospective case reports and a prospective family study in the context of didactic material.

Results: Principles can be applied across all medical and surgical specialties.

Conclusions: Increasingly important for clinical medicine, knowledge of practical genetics can improve patient care.

17 Impact of Stereotyping on Medical Decisions

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Objectives:

1. Define stereotyping in medicine.
2. Discuss the impact of stereotyping on health care.
3. List some means by which one can avoid stereotyping.

The population in the United States is diverse in terms of culture, ethnicity, and religion. This diversity is increasing, and it is expected that, in a few decades from now, people from diverse cultures will outnumber the Caucasian population in the United States. This same trend is seen elsewhere. Health care providers must adapt themselves to care for such diverse populations. There is evidence that physicians have biases when they manage minority patients. These biases and stereotyping can affect the care and the health of patients.

18 Research Center at King Fahad Medical City in Riyadh, Saudi Arabia: Opportunities, Challenges, and Potential Role for the IMANA

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Member IMANA Board of Regents*

King Fahad Medical City (KFMC) is a four-hospital medical complex with a total bed capacity of 1095 and an onsite medical school with problem-based learning curriculum. It was built for \$2.3 billion Saudi Riyals (more than \$600 million) and inaugurated in 2005 under the auspices of the Ministry of Health (MOH) to serve as a regional leader in patient care and human health resource development in the

Kingdom of Saudi Arabia (KSA). King Fahad Medical City is considered the largest and most advanced medical complex in the Middle East, and it cares for the large number of patients the MOH caters to in the KSA, which is estimated to be 70% of all KSA citizens. Since its humble beginnings in 2005, the hospital has shown rapid growth in its programs, outreach, and patient enrollment. In 2007, a new research center (RC) was started at KFMC. This presentation will focus on the challenges and opportunities provided in establishing a research center in a developing Muslim country with its unique culture, ethos, work environment, and work force. Some of the initial questions addressed in setting the goals for the center were the following:

1. What type of research should take precedence? Basic, clinical, applied, or a matrix?
2. What is the role of the research center? Supervisory, regulatory, and supportive or a more centralized body controlling all research?
3. Should research be institution-driven, based on local needs and disease prevalence, or patterned after the individual interests of the researchers?
4. How can interest be generated among the diverse staff of local Saudis and the large number of expatriates?
5. What relationships should be established with research centers in KSA and elsewhere, e.g. the National Institutes of Health (NIH) in the United States?

6. What role can organizations such as the IMANA play in advancing/supporting the research initiatives in KSA and other Muslim countries?

As director of this project, I will share personal anecdotes and views regarding the following:

1. Future trends for advancing medical knowledge via research in the Muslim world with the ultimate objective of enhancing patient care and improving physician practice patterns.
2. How research centers can serve as a bridge between the East and West for sharing information.
3. How organizations such as IMANA and its multifaceted, talented members can play a leading role in accomplishing this. I will also very briefly touch upon the concept of developing model knowledge-based cities such as Medina City, in which organizations such as the IMANA can play an active role.

19 Treatment of Anorectal Diseases by al-Rāzī

*Adil H. Al Humadi, MD, FACS, FASCRS
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Objective: This article discusses the treatment of hemorrhoids, fistula, and fissure by the eminent Muslim scholar al-Rāzī in his book *al-Ḥāwī fi al-ṭibb*.

Al-Rāzī described three types of hemorrhoids: (1) longitudinal, which is shaped like a radish, (2) wide donut, which is shaped like a grape, and (3) mulberry. The “blind” hemorrhoid is also noted as the external thrombotic type. Al-Rāzī attributed the cause of hemorrhoids to an increase of blood flow, an increase in the viscosity of the tissue, or both. A rupture of the vessel end in the venous plexus due to the increase in pressure in the main vessel connecting to the liver will increase the flow of blood in the hemorrhoidal tissue, sometimes causing bleeding. The anorectal region is rich in sensory nerves that are connected to the anal sphincter muscle, which is circular in position, allowing it to close the anus perfectly.

Al-Rāzī described three surgical approaches to treating hemorrhoids:

1. Banding with silk or cotton thread (*khazem*), which he inserted through a needle to suture and transfix the base of the hemorrhoid and tie it over a few times for gradual destruction.

2. Gradual banding, during which the hemorrhoid was gradually squeezed daily at the base by a thread of silk, which was tightened by a piece of wood, until it falls off.

3. Excision by holding the hemorrhoid with a hook or rough cloth and excising it from the root while the patient is on his back, followed by spraying astringent powder, and dressing. The hemorrhoid should not be cut near the anal opening or it will lead to incontinence. In order to avoid cutting the anal sphincter, he asked the patient to contract and close the anal sphincter during the procedure. A Sitz bath and ointment with dressing are helpful after surgery. For bleeding hemorrhoids, he used an astringent agent suppository and even smoking. He also discouraged the patient from having bowel movements for a few days.

For an anal fistula near the anal opening, which is superficial to the sphincter, he found it was safer to probe and cut it than the one further away from the anal sphincter, which is deeper than the anal sphincter. Surgical excision of the deeper fistula would cause incontinence. He introduced the probe into the fistula tract and guided with his left finger in the anal canal and used silk thread as a seton silk. If there were multiple fistula, he would open them and connect them.

For an anal fissure, he encouraged the use of a probe to scratch it several times until it bled and then dressed it with anal ointment.

The details of the symptoms, diagnosis, and treatment will be described to prove that Al-Rāzī's medical and surgical treatment for anorectal disease was well recognized and treated with utmost care and diligence.

20 Al-Rāzī Memorial Lecture: Thirty Years Experience with Management of Cerebral Arteriovenous Malformations and Lessons Learned

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Abstract not received before the JIMA publication deadline.

21 Newer Treatments for Chronic Limb Ischemia

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Revascularization with bypass used to be the standard treatment of lower limb ischemia caused by occlusion or severe stenosis of the superficial femoral artery (SFA). With the advent of newer less-invasive modalities, treatment approaches are rapidly changing. Modalities such as angioplasty, stenting, cryoplasty, laser angioplasty, or Viabhan endograft are now being routinely performed with lesser morbidity, mortality, and shorter hospital stays.

This paper will examine the various newer

modalities for revascularization, their present indications, success rate and examine how the vascular surgeons are using these tools for salvaging limbs.

22 Are Cosmetic Surgery and/or Cosmetic Procedures Allowed in Islam?

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Objective: Demand for cosmetic surgery and procedures is rising at an exponential rate. Cosmetic services can range from minimally invasive procedures (such as over-the-counter peels) to surgical interventions. Providing these cosmetic services is often lucrative, and, therefore, often places realistic pressures on physicians to offer these services. However, the Islamic perspective/stance on the issue is still unclear.

Design: A panel discussion comprising Islamic scholars and physicians to discuss these pertinent issues; positions will be based upon the Qur'an and Ahadith.

Conclusion: The goal is to expose the audience to the various perspectives and opinions regarding this complicated issue.

23 Radiology of Monitoring Devices

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The management of critically ill patients requires monitoring of cardiopulmonary status by various devices. The devices that help save lives in the intensive care unit can also cause serious complications, many of which are first detected on radiographs. Radiological evaluation is required to demonstrate the locations of these devices, any malposition, and associated complications.

The monitoring devices include the following:

1. Endotracheal and tracheostomy tubes
2. Nasogastric and nasoenteric tubes
3. Thoracic venous catheters
4. Swan Ganz catheters
5. Intra-aortic balloon catheters
6. Pleural drainage tubes
7. Cardiac pacemakers
8. Automatic cardioverter defibrillation devices

This presentation will describe the indications and proper location of monitoring devices, illustrate malpositioning, and also show examples of the various complications associated with these devices.

24 Panedemic Influenza

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