

# Kanal's Magnetic Resonance Medical Director/Magnetic Resonance Safety Officer MR Safety Training Course

**The course that started it all!**

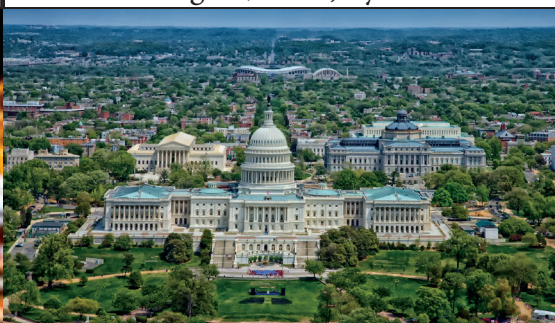
*"Dr. Kanal doesn't just throw information at you. He makes you use critical thinking skills in order to understand and apply the information. He is truly teaching you."*

*MRMD/MRSO Prior Course Attendee; Orlando, 2022*

Las Vegas, NV - March 19 - 22



Washington, DC - July 23 - 26



Orlando, FL - October 15 - 18



## Offers up to 26 hours of CME/CE/MPCEC Credit

Since June of 2014 when Dr. Kanal first created and launched his new comprehensive MR safety course and began teaching others the Kanal Method for implant safety analysis, more than 7,000 physicians, technologists, physicists, nurses, administrators, industry representatives and others have now participated in one of Dr. Kanal's MRMD/ MRSO MR Safety Training Courses - in just over seven years, three of which have been during the Covid pandemic!

The unprecedented popularity of this course and analytical method of risk assessment has literally changed the entire MR industry and how it approaches MR safety practices and decision making throughout the world. This Course is specifically designed to provide the education necessary to comfortably undertake the responsibilities of being an MR Medical Director/Physician or MR Safety Officer.

The updated course now includes a focus on risk assessment of MR scanning of patients with implanted devices labeled for only 1.5T and/or 3T MR scanners - on MR scanners of <1.5T strength and various orientations of their static magnetic fields

## Featured Speaker

### Emanuel Kanal, MD, FACR, FISMRRM, MRMD/SE, AANG

Chief, 24/7 Division of Emergency Radiology  
Director, Magnetic Resonance Services  
Professor of Radiology and Neuroradiology  
University of Pittsburgh Medical Center

Dr. Kanal has been involved in researching and teaching the world about magnetic resonance (MR) safety issues for more than 35 years, since the introduction of MRI as a clinical diagnostic tool. Having chaired the first magnetic resonance safety committee ever created, he also chaired numerous other MR safety committees and has been continually involved in and/or leading MR safety initiatives ever since. These include, among others, having chaired the MR Safety Committee for the American College of Radiology from its inception in 2001 until the summer of 2012, being awarded fellowship in the American College of Radiology as well as the International Society of Magnetic Resonance in Medicine, and being named a Special Government Employee to the Food and Drug Administration on MR safety issues for both the Division of Medical Imaging and Hematology Products/Drug Safety group (of the Office of Surveillance and Epidemiology) regarding magnetic resonance contrast agents as well as the FDA Center for Devices and Radiological Health regarding all matters relating to magnetic resonance safety.

Dr. Kanal has served as a consultant for MR safety issues with innumerable industry and pharmacy representatives, from MR system manufacturers to implant manufacturers to MR pharmaceutical firms to manufacturers of devices designed to be used in and around MR suites. He has been involved in an advisory/consultant role and/or as an expert witness in hundreds of legal cases including those involving/alleging radiofrequency thermal issues or burns from MR imaging examinations, projectile effect events/injuries related to the interactions between the magnetic field of the MR scanner and metallic objects in the MR environment, those alleging auditory injury/tinnitus, and cases involving nephrogenic systemic fibrosis and/or other gadolinium based contrast agent related adverse events, among others. Dr. Kanal is the lead author of the American College of Radiology's Guidance Document on MR Safe Practices in all of its published versions and updates (2002, 2004, 2007, 2013, and is a coauthor on the 2019 update). Most recently, Dr. Kanal is the lead author of the 2020 ACR Manual on MR Safety. As an educator, Dr. Kanal has taught more people about MR safety issues than any other physician in the world today, and has provided several hundred visiting professorships and invited societal lectures and conferences on this topic over the past three decades.

## Accreditation

**Program Description / Statement of Need:** In an effort to provide Physicians, Technologists, and other course attendees with current information and data to make informed decisions in their clinical settings, this symposium covers several objectives. These include teaching and reviewing the basic principles underlying the potential areas of safety concern involved in the MR imaging process and magnetic resonance environment. In addition, defining the thought process algorithms for assessing whether a patient/device/implant/ foreign object can safely undergo MR imaging, and familiarizing the attendee with medico-legal considerations associated with MR safety.

**Target Audience:** The content of this CME Symposium is intended for healthcare professionals including Radiologists and other Physicians, Technologists, Physicists, Radiologic and Imaging Nurses, Radiology Administrators, Facility Managers, Researchers, Risk Managers, and others.

**Accreditation and CME Credit Statements:** This CME activity has been planned and implemented in accordance with the Essential Areas and Policies of the Accreditation Council for Continuing Medical Education (ACCME). Northwest Imaging Forums, Inc., is accredited to provide continuing medical education for physicians. Northwest Imaging Forums, Inc. designates this live activity for a maximum of 26 *AMA PRA Category 1 Credits*<sup>TM</sup>. Physicians should claim only the credit commensurate with the extent of their participation in the activity. Nurses may claim credit for activities approved for *AMA PRA Category 1 Credits*<sup>TM</sup> in most states, for up to 50% of the nursing requirement for recertification. This activity is designated for up to 26.0 *AMA PRA Category 1 Credits*<sup>TM</sup>.

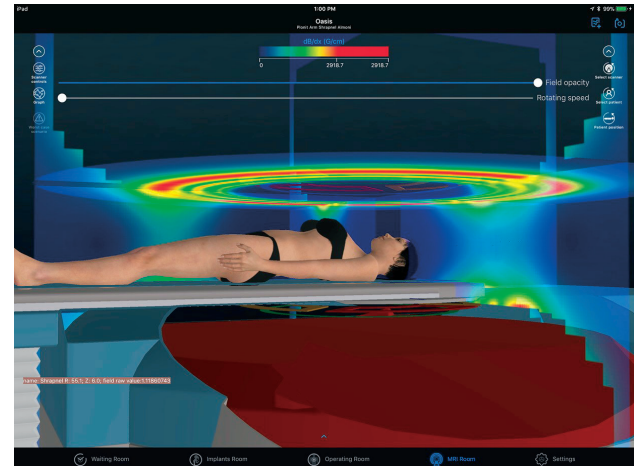
**This MRI program** has been submitted for approval of 26 hours of category A CE technologist credit as designated by The International Society for MR Radiographers & Technologists (ISMRT) RCEEM. ARRT regulations state that an individual may not repeat a live activity for credit if it was reported in the same or any subsequent biennium. To receive the maximum amount of credit hours, you must attend all sessions. Verification of attendance policies will be in place for each lecture.

This meeting has applied to CAMPEP for approval of 26 MPCEC (Medical Physics Continuing Education Credit) hours.

**Faculty and Planner Disclosures:** As an accredited provider of continuing medical education, it is the policy of Northwest Imaging Forums Inc., to ensure balance, independence, objectivity, and scientific rigor in all of its live activities. In accordance with this policy, faculty and planners must disclose any financial relationships with commercial interests germane to program content. The planner has nothing to disclose. Additionally, in the event a conflict of interest (COI) does exist, it is the policy of Northwest Imaging Forums Inc., to ensure that the COI is resolved in order to ensure the integrity of the CME activity.

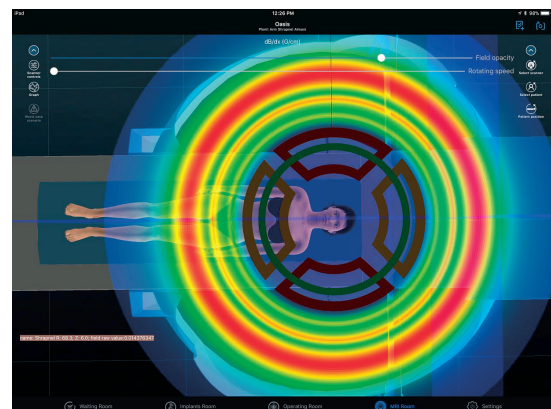
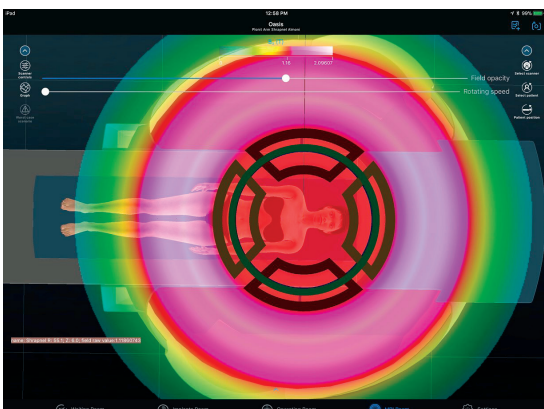


# The new standard for device/implant MR Safety assessment: MagnetVision™



Added to our 2018 curriculum and beyond is MagnetVision™. As highlighted in the featured cover story of the RSNA, November, 2017 issue of Radiology Today, Dr. Kanal ushered in the 2018 year with the introduction of his latest MR safety app. With a tag line of, “Making the invisible... visible™”, the app is a powerful teaching and reasoning tool that is designed to help the MR practitioner or MR safety professional visually assess, graphically process, and even generally quantify the anticipated risks of an implant patient prior to their undergoing an MR imaging examination on a given MR imaging platform and hardware suite. The app permits the user to model an implant patient's body habitus, select or create the implant(s) or device(s) or foreign body/bodies found in that patient, and “implant” it three dimensionally within the patient model or avatar created by the app. The app will then model the exposure levels of that patient and their implanted device(s) to the various energy fields used in the MR imaging process on the specific MR imaging system make/model/hardware selected by the user for simulation. The app calculates anticipated exposure levels of the implanted device(s) to the various energies to which it will be exposed before, during, and after the patient is positioned for the requested MR imaging examination. This real time 3D graphical as well as 2D graphs as well as text-based output and reports can be readily utilized to help MR professionals assess general MR safety risks for requested MR examinations on such device patients before they are actually placed into actual MR scanners and exposed to real transmitted static and time varying electrical and magnetic energy fields.

Highly detailed reports generated by the app can be printed or saved as .pdf files for teaching or record keeping purposes, complete with real time date and time stamping documentation.



## Educational Objectives and Course Descriptions

### 26 Hour MR Medical Director / MR Safety Officer

The American College of Radiology Guidance Document on MR Safe Practices has solidly established itself as the standard of care for how one should safely practice in the MR environment. In addition to near universal acceptance throughout the radiologic community, it has been repeatedly established in innumerable legal actions as the standard against which our actions in this regard are judged. The ACR's Guidance Document on MR Safe Practices calls for each MR site to name an MR Medical Director and/or MR Safety Officer who would serve as the ultimate authority and resource for all questions and decisions related to MR safety. The recently published international consensus document, "Recommended Responsibilities for Management of Magnetic Resonance Safety" calls for establishing and naming a Magnetic Resonance Medical Director, Magnetic Resonance Safety Officer, and a Magnetic Resonance Safety Expert to oversee safety in MR environments. In this regard, there is a significant shortage of individuals in the world today who have sufficient background in, and knowledge of, the subject matter to feel comfortable being named as the MR Medical Directors or MR Safety Officers for their MR imaging centers and sites. This course is specifically targeted to support those whose job it is - or will be - to fulfill these requirements of MR Medical Director or MR Safety Officer. For those considering becoming MR Safety Experts, this course is not intended to teach or review the quantification algorithms required of this title/position. It does, however, provide an exceedingly comprehensive introduction to and overview of all matters pertaining to MR safety, while simultaneously highlighting that which a reasonably trained MRMD and MRSO should be expected to know - and not know.

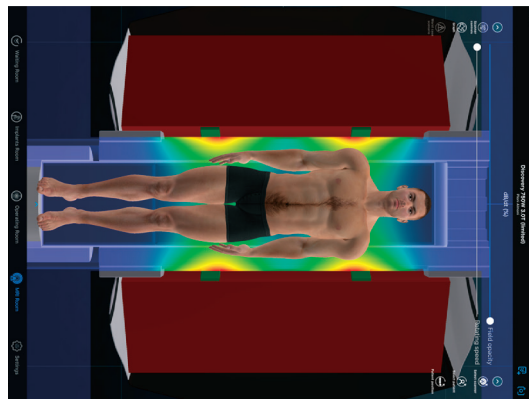
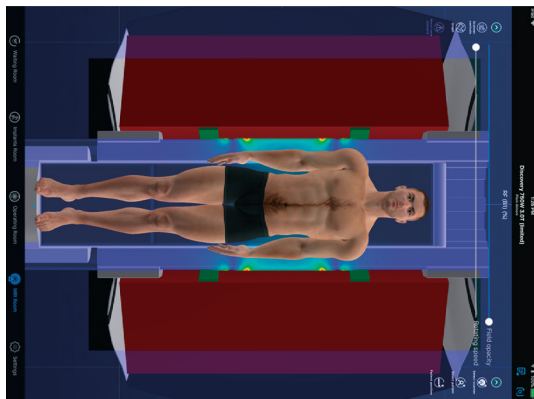
### This Course is Conceptually Divided into Three Unique Parts

1. Teaching and reviewing the basic principles underlying the potential areas of safety concern involved in the MR imaging process and magnetic resonance environment. This includes defining the roles and responsibilities of the MR Medical Director, the MR Safety Officer, and the MR Safety Expert and how they interact with those of the referring physician, radiologist, and MR technologist. It also incorporates a review of several new recommendations and/or requirements for MR safety, including those by the Joint Commission, ACR, and the recommendations of the (2016) published international consensus document entitled, "Recommended responsibilities for management of MR safety".
2. Defining and standardizing the thought process algorithms for assessing whether a patient/device/implant/foreign object can safely undergo MR imaging; reviewing the benefit-risk assessment process and establishing protocols and guidelines as to how to formalize the benefit-risk ratio assessment for each patient. Applying these algorithms and this reasoning approach to multiple real and created clinical cases and situations is an integral aspect of this part of the course.
3. Medicolegal aspects of MR safety: Learning from the mistakes of others. In this section, numerous real legal cases in which MR safety-related medical malpractice was alleged will be reviewed and analyzed. The objective will always be to learn how to decrease the likelihood of similar issues arising with your patients in your own MR practice.

### Topics to be Covered Include, Among Others:

- Static Magnetic Fields
- RF Magnetic Fields
- Gradient Magnetic Fields
- Safety of Gadolinium-Based Contrast Agents, including state-of-the-art review of the current status regarding residual/retained gadolinium
- Cryogen Safety Considerations
- Implant Safety; Clinical Application and Decision Making
- Cardiovascular Implanted Electrical Devices (CIEDs)
- Pregnancy and MRI
- Legal Considerations: Overview, in Depth Case Histories and Review
- ACR Manual on MR Safety
- Implant Safety: Kanal's MR Safety Implant Risk Assessment app: decision tree review and utilization
- Implant Safety: MagnetVision™ and standardization of the processes for evaluating device/implant risk assessment

*"I'm very thankful that this course is available. I'm a much safer physician as a result"*  
Prior MRMD/SO Course Attendee





All lectures will be given by Dr. Kanal unless otherwise noted.

## Day 1 (6.0 Hours)

Schedule times and contents are subject to change

### Sunday

- 11:00** *Registration Desk Opens*
- 12:15** Opening Announcements - *Matt Wilson*
- 12:30** Spotlight on GBCAs
- 2:50** *Coffee Break*
- 3:00** Introduction, MRMD, MRSO, MRSE
- 5:00** Static Magnetic Fields Part I, II
- 7:00** *End of Session*

## Day 2 (8.0 Hours)

Schedule times and contents are subject to change

### Monday

- 6:30** *Registration Desk Opens - Coffee, Tea & Pastries*
- 7:20** Opening Announcements - *Matt Wilson*
- 7:30** Static Magnetic Fields Part III
- 8:30** Static Magnetic Fields Part IV
- 9:30** *Coffee Break*
- 10:00** Static Magnetic Fields Part V
- 11:00** RF Magnetic Fields Part I
- 12:00** *Lunch on Your Own*
- 1:15** RF Magnetic Fields Part II
- 2:15** RF Magnetic Fields Part III
- 3:15** *Coffee Break*
- 3:45** RF Magnetic Fields Part IV
- 4:45** RF Magnetic Fields Part V
- 5:45** *End of Session*

*(Faculty, topics & format subject to change)*

*Presentations will be given in the traditional classroom lecture format using slides. Each presenter will allow time to field questions from the audience. The handout will provide "take away" self-review material. Permission for the use of copyrighted materials will be obtained if needed.*

## Day 3 (8.0 Hours)

Schedule times and contents are subject to change

### Tuesday

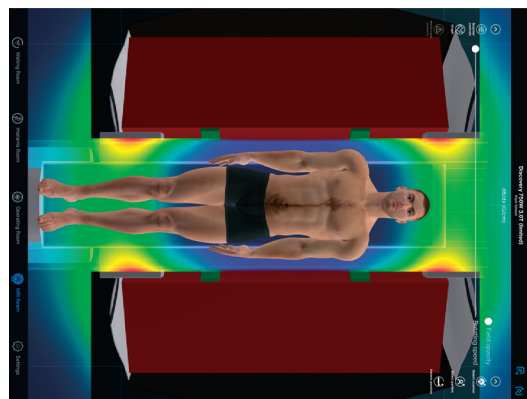
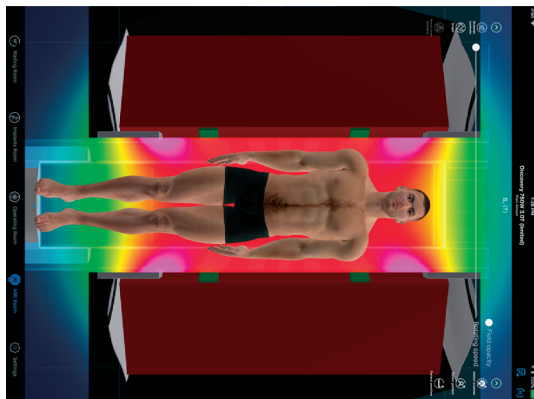
- 6:30** *Registration Desk Opens - Coffee, Tea & Pastries*
- 7:20** Opening Announcements - *Matt Wilson*
- 7:30** Gradient Magnetic Fields
- 8:30** Safety of Gadolinium-Based Contrast Agents
- 9:30** *Coffee Break*
- 10:00** A Practical Real-World Approach to Clinical Low Field Device MR Safety Assessment. Scanning below 1.5T for devices only labeled for 1.5T and/or 3T
- 11:00** Cryogen Safety Considerations
- 12:00** *Lunch on Your Own*
- 1:15** Implant Safety: Clinical Application and Decision Making Part I
- 2:15** Implant Safety: Kanal's MR Safety Implant Risk Assessment app: Decision tree review and utilization
- 3:15** *Coffee Break*
- 3:45** Implant Safety: Clinical Application and Decision Making Part II
- 4:45** Review Safety Considerations and Documented Case Illustrations
- 5:45** *Dinner on Your Own*
- 7:00** Poolside Chat™ - Emanuel Kanal, MD

## Day 4 (4.0 Hours)

Schedule times and contents are subject to change

### Wednesday

- 6:30** *Registration Desk Opens - Coffee, Tea & Pastries*
- 7:20** Opening Announcements - *Matt Wilson*
- 7:30** Product labeling and off-label imaging: The FDA does not approve uses of drugs/devices
- 8:30** Legal Considerations: Part I
- 9:30** *Coffee Break*
- 10:00** Legal Considerations: Part II
- 11:00** Legal Considerations: Part III
- 12:00** *Lunch on Your Own - End of Session*





## Pool Side Chat™

One of the most valuable aspects of this course is its unique Poolside Chat™. In this session the attendees gather after hours in an informal format and are encouraged to ask any and all questions that they may have regarding MR Safety issues. These are then publicly discussed, analyzed, and addressed in a manner that not only answers the questions posed, but provides and teaches the attendee a logical framework as to how to reason their way to answer such questions in clinically realistic situations. Discussion, debate, and reasoned progression through available options are key factors of this session. The Poolside Chat™ is routinely evaluated as one of the most valuable and unique aspects of this course.



*This CME/CE activity is designed for Radiologists and/or other Physicians, Technologists/Radiographers, Physicists, Healthcare Risk Managers, MR Research personnel, and any other present and/or future MR Medical Directors or MR Safety Officers.*





## Luxor Hotel & Casino - Las Vegas - March 19 - March 22, 2023

We will meet in the fabulous LUXOR Hotel & Casino, the thirty story glass “Pyramid” on the famous Las Vegas strip. Located just 2.5 miles from McCarran International Airport, this elegant, 4,300 room hotel is the perfect setting for both business and pleasure. With eight restaurants, showroom entertainment, a 120,000 square foot casino and many attractions such as The Titanic Show & Museum, there is much to see and do. Across the street are the spectacular MGM Grand and Excalibur Hotels, offering yet more entertainment and fun. Las Vegas offers all its visitors unparalleled 24 hour excitement. There is truly something for everyone in this city of lights, glamour and fun.

### Room Reservations - 3900 S Las Vegas Blvd, Las Vegas, NV 89119

We have been given special reduced sleeping room rates at the The Luxor Hotel and Casino of Room rate of \$219 per night for Saturday and \$55 per night for Sunday through Wednesday plus tax/resort fees. Please contact the hotel by dialing toll free 800-926-4737 or 702-262-4450 and refer to Group Code: TBD or copy the following link into a web browser: <https://book.passkey.com/go/TBD>. Please call or email us if you have any questions. **IMPORTANT NOTE:** The meeting will be held in the Egyptian Ballroom, **Cutoff Date is Thursday February 16th, 2023 or when our reserved room block sells out (whichever comes first).**

### Cancellation Policy

**All cancellation requests must be in writing.**

1. Cancellations received on or before: 03/03/23 will receive a full refund.
2. Those received after 03/03/23 but through 03/10/23 are subject to a 25% service charge.
3. No credit or refunds are available on or after 03/11/23. **No exceptions will be made.**

In the event that any situation beyond the control of NWIF makes it impossible to conduct the meeting as advertised, each paid attendee will receive a voucher to attend a future NWIF meeting.

### Registration Fees

**Please Note:** - Early Fee is payment received on or before 03/03/23  
- Standard Fee is payment received after 03/03/23 through 03/10/23  
- Late Fee is payment received on or after 03/11/23

#### Kanal's MR Medical Director / MR Safety Officer Training Course

##### Physicians and Industry Representatives:

Early Fee \$1550 Standard Fee \$1600 Late Fee \$1650

##### Physicists and Other Health Care Professionals:

Early Fee \$1175 Standard Fee \$1225 Late Fee \$1275

##### Technologists:

Early Fee \$800 Standard Fee \$850 Late Fee \$900

*"You can't sit in the room  
and avoid learning if you  
tried!"*

Prior MRMD/ISO Course  
Attendee

# Hilton Washington Dulles Airport - Washington DC

July 23<sup>rd</sup> - July 26<sup>th</sup>, 2023

Located just three miles from Dulles International Airport (IAD) and 30 miles from Washington DC, this hotel is ideal for both business travelers, with its proximity to local corporations and government offices, and leisure guests seeking to explore the area or take the metro to the popular attractions of DC. Features include spacious guest rooms, on-property dining options, a large fitness center and a salt water swimming pool. Featuring 449 rooms & suites with complimentary in-room WiFi, Hilton Washington Dulles Airport was designed with comfort in mind. Upgrade to a suite for extra space or an executive room for special amenities. Executive floor guests receive access to the Executive Lounge, offering complimentary breakfast & evening hors d'oeuvres.

## Room Reservations - 13869 PARK CENTER ROAD, HERNDON, VIRGINIA, 20171

We have been given special reduced sleeping room rates at the Hilton Washington Dulles Airport of **\$129.00** per night plus tax. Please contact the hotel by dialing (703) 478-2900 and ask for the group code "NWIF2023" or copy the following link into a web browser: [Book Now](#) Please call or email us if you have any questions.

**IMPORTANT NOTE:** The meeting will be held in the Belmont Ballroom Main Level  
**Cutoff Date is July 4th, 2023 or when our reserved room block sells out (whichever comes first)**

## Cancellation Policy

**All cancellation requests must be in writing.**

1. Cancellations received on or before: 06/30/23 will receive a full refund.
2. Those received after 06/30/23 but through 07/07/23 are subject to a 25% service charge.
3. No credit or refunds are available on or after 07/08/23. **No exceptions will be made.**

In the event that any situation beyond the control of NWIF makes it impossible to conduct the meeting as advertised, each paid attendee will receive a voucher to attend a future NWIF meeting.

## Registration Fees

**Please Note:** - Early Fee is payment received on or before 06/30/23  
- Standard Fee is payment received after 06/30/23 through 07/07/23  
- Late Fee is payment received on or after 07/08/23

### Kanal's MR Medical Director / MR Safety Officer Training Course

#### Physicians and Industry Representatives:

Early Fee **\$1550** Standard Fee **\$1600** Late Fee **\$1650**

#### Physicists and Other Health Care Professionals:

Early Fee **\$1175** Standard Fee **\$1225** Late Fee **\$1275**

#### Technologists:

Early Fee **\$800** Standard Fee **\$850** Late Fee **\$900**

*"If MR Safety were a theater production, this would be it!"*

Prior MRMD/ISO Course Attendee



# Sheraton Orlando Lake Buena Vista Resort - Orlando, FL

October 15<sup>th</sup> - 18<sup>th</sup>, 2023

Surrounded by the city's iconic attractions, Sheraton Orlando Lake Buena Vista Resort is a Walt Disney World Good Neighbor® Hotel that sits one mile from Walt Disney World® Theme Parks and provide free scheduled shuttle to these parks. Disney Springs®, Walt Disney World® Golf Courses and Outlet Shopping as well as other amusements, such as Universal Studios®, Discovery Cove and Disney's Typhoon Lagoon Water Park, are also nearby. During your stay, dine on fresh seafood at Zest or sip cocktails on the patio at 27 Palms Grill. While your kids ride the waterslides, relax with a spa treatment or get energized in our 24-hour fitness center. We offer 29 venues for events of up to 900 guest, along with catering services and modern AV equipment. After a day exploring Lake Buena Vista, recharge in your spacious room outfitted with stylish décor, plush beds and a private balcony. Keep the kids entertained with HDTV and premium cable channels. The magic of Orlando begins at Sheraton Orlando Lake Buena Vista Resort.

## Room Reservations - 2205 S Apopka Vineland Road, Orlando, Florida 32836

We have been given special reduced sleeping room rates at the Sheraton Orlando Lake Buena Vista Resort of \$139.00 per night plus tax. Please contact the hotel by dialing 1-800-423-3297 and ask for the group code "Northwest Imaging Forum" or copy the following link into a web browser: [Book Now](#) Please call or email us if you have any questions.

**IMPORTANT NOTE:** The meeting will be held in the Majestic Ballroom **Cutoff Date is Friday September 29, 2023 or when our reserved room block sells out (whichever comes first)**

## Cancellation Policy

**All cancellation requests must be in writing.**

1. Cancellations received on or before: 9/29/23 will receive a full refund.
2. Those received after 9/29/23 but through 10/06/23 are subject to a 25% service charge.
3. No credit or refunds are available on or after 10/07/23. **No exceptions will be made.**

In the event that any situation beyond the control of NWIF makes it impossible to conduct the meeting as advertised, each paid attendee will receive a voucher to attend a future NWIF meeting.

## Registration Fees

**Please Note:** - **Early Fee** is payment received on or before 9/29/23

- **Standard Fee** is payment received after 9/29/23 through 10/06/23

- **Late Fee** is payment received on or after 10/07/23

### Kanal's MR Medical Director / MR Safety Officer Training Course

#### Physicians and Industry Representatives:

Early Fee **\$1550** Standard Fee **\$1600** Late Fee **\$1650**

#### Physicists and Other Health Care Professionals:

Early Fee **\$1175** Standard Fee **\$1225** Late Fee **\$1275**

#### Technologists:

Early Fee **\$800** Standard Fee **\$850** Late Fee **\$900**

*"I did not realize how much about MR safety I did not know"*

Prior MAMDI/SD Course Attendee

## Comments From Past Attendees of Kanal's MRMD/MRSO MR Safety Training Courses

**"Without a doubt the best meeting I've ever been to!"**

"I have traveled a tremendous amount all over the world and attended a lot of meetings with world experts. However, you have set the standard once again."

**"A tsunami of information."**

"Perfect mixture of information, related stories, and humor."

**"The best source of information of any conference I have ever attended for over 30 years."**

"It's truly amazing that someone could make 22+ hours of MRI safety lectures engaging. I would attend again."

**"This was by far the best conference that I have ever attended! I never dreamed that I could learn so much in 4 days."**

"Thought provoking, engaging, educational, overall incredible."

**"The most information in a conference - ever"**

"The excitement and enthusiasm is contagious"

**"If you are MRI technologists, you need this!"**

"Awesome! Incredible amount of information in just a few days!"

**"It was the most incredible course, ever. Each and every second was educational... I could listen to Manny give instructions on how to make a peanut butter and jelly sandwich and enjoy every minute of it."**

"Dr. Kanal is by far one of the best speakers I've ever heard - if not the best"

"So much I didn't know after 20 years of experience"

**"This was, without a doubt, THE BEST conference I have ever been to... I do not know any other human being that can talk physics and MRI for almost 4 days, and not even once make it drab."**

"Outstanding! Priceless information! Ground breaking!"

"Necessary for entire MR community."

"I'm so glad I came! Mind blown - in a very good way! My wheels are churning... all the improvements I want to make now!"

"Eye opening, reassuring, and ridiculously informative!"

"An amazing amount of information"

**"Game changer!"**

"Awesome - SO glad I attended!"

"A new way to think..."

**"Far exceeded my expectations"**

"I've never been able to concentrate on anything for this many hours before."

**"Dr. Kanal's passion for patient care, MR expertise, and ability to transfer that knowledge is amazing"**

"High energy "infotainment""

**"Mind blowing experience! The amount of information received to help myself and my department make decisions is immeasurable."**

"Absolutely amazing. Extremely engaging, thoughtful, and educational."

**"I am in awe of the information that I learned. I have no words others than "PHENOMENAL".**

"It's AMAZING how available he makes himself to everyone with time and attention - EXCEPTIONAL."

**"Incredibly informative for the consulting physicist."**

"Engaging, relevant, held my attention for all the hours, made me love the work I do more."

**"All time favorite course."**

"Great course with career changing information"

**"Best thing I could have ever done for my professional career."**

"This symposium has stepped up my MRI game and my whole team will benefit!"

**"This was exhausting and amazing - I would do it again in a heartbeat!"**

**"All radiologists, technologists, and managers should be required to attend..."**

**"Paradigm altering. My entire thought process towards MRI safety has altered."**

"Dynamic, clear, concise"

**"A force of nature! "**

"Blows one's mind!"

"Without a doubt the most comprehensive MR safety lecture I have ever attended. I leave this seminar asking, "What would Manny do?"



# Comments From Past Attendees of Kanal's MRMD/MRSO MR Safety Training Courses

*Elise Gough, RT(R)(MR)(CT)MRSO(MRSC™)  
MR Imaging Specialist, RadNet*

"I'm using your MR safety training every day.

We have 8 magnets, 3 different field strengths, and I have the call center call me with any and all implants and foreign bodies. So averaging 120 patients per day, I'm usually looking into about 12-14% of our daily patient load.

I am Researching implants, then deciding which magnet based on surgical metal in the field of view, or conditions of the implant and notifying scheduling. Alerts and MR safety notes go into each patient's file describing the implant, and the conditions under which the tech must scan. The tech then completes the circle of care by documenting how they scanned the patient, with the ultimate goal of releasing the patient and their implant in the same condition which they arrived.

I tell you all this not to boast but because I would not have the confidence, nor would I have the trust of my Radiologists without YOU, the ABMRS and getting certified in 2015.

My MRMD ( thank Heaven!!) and I have changed how the sites are run, constantly educating the MR techs, MR Aides, and call center staff. I thought you should know the profound affect my MR safety training has had and is still having on our little group!"

*Frank Atoria R.T. (R) (MR) MRSO (MRSC™)  
Advanced Medical Imaging of Old Bridge & Toms River - New Jersey*

"I run a one man show on a GE 1.5T magnet with 3 P.D. techs for some evenings and Saturdays. For 2015, we scanned approximately 3900 exams...

Since November (I was at the Orlando seminar) I have embarked on rewriting the P & P manual for MR, we have a video camera (for Zone 3 surveillance) on order, there are plans to build a partition between Zones 2 and 3, both needed because of the physical layout of the office. Once spring comes, we will have the Cryo vent pipe professionally inspected (for the first time since installation - 16 years ago. Administration had no idea it was our responsibility.)

I have put together (so far) two fairly nice Powerpoint presentations, one relating to Emergency Responders and one for the office staff. In January I had 2 in-house seminars for our local fire department with just under 50 firefighters in attendance including the Chief and Deputy Chief at both sessions. I had an in-depth meeting with the Township OEM coordinator, which he greatly appreciated and he promised to distribute my E.R. Powerpoint videos. Today I will be visiting the Township Police Department and giving a talk there and handing out more E.R. PP videos.

I have implemented yearly re-screening and re-education of all staff, nontechnical as well as technical. Everyone has been classified as Level 1 or Level 2 (or non-MR) personnel. I have an on going education/interesting facts program going on.

All this is going on not only at my office but at our two sister sites which I have under my auspices. I have also recently been "lent out" to our affiliated Medical Center to rewrite their yearly MR Safety in-service.

**It's been a busy time and I love it and my job more than ever. I've been in MR for 30 years now and I feel just as fresh now as I did back then.**

Thank you for everything you do."

*Anonymous*

Each time I attend your course (two full MRSO and one refresher), I come away a better technologist than I was when I arrived. The key is allowing the reorganization to happen and pushing past the comfort of 'this is how I was taught' or 'this is how we have always done it' and accepting the challenge of new ways of thinking and processing information."

# Comments From Past Attendees of Kanal's MRMD/MRSO MR Safety Training Courses

**Joel Randal BA, RT(R) CT, MR, MRSO**  
**Lead MRI Technologist - Sewickley Valley Hospital**

"I was fortunate to be able to attend the MRSO training class in October and have been working hard at applying what I learned at that conference to the benefit of our patients. **The MRSO course was very helpful to me. It gave me the methodology on how to approach these kinds of situations and the confidence in assessing each situation in the MRI environment.** It is always a great reward to know that this training and knowledge related directly to providing care for one of our patients. Thank you for helping to lead the way."

**Sina Alacano, (ARRT) (R) (M) (MR) (MRSO)**  
**Reno Diagnostic Centers.**

"I wanted to give you an update as to what has happened since my MRSO credentialing and the various tasks, issues, challenges and changes that have occurred since I have returned home... It's been a very busy time for me since Orlando; however, I know that everything, I am about to tell you, has been a positive stroke for everyone involved.

I work at a very busy and advanced out-patient facility. For our area we are leading the community in MRI technology... We average approximately 30 patients per scanner, daily... Upon my recognition as an MRSO, my Medical Director and other management had a meeting with me. This is where I was able to demonstrate my new found knowledge. I had a job description written up, a list of policies and procedures we needed to implement, new ideas to increase business, thoughts on how to increase workflow and throughput, MRSO goals, etc. Oh, and my Medical Director LOVED the Decision Tree, Dr. Kanal.

All of my ideas were well received. Here is a list of many new guidelines, directives, policies/procedures we have implemented.

1. Schedulers now send email to "MRI Screening Implant Work group" when scheduling patient so that a patient's implant/device can be researched and approved. This equates to less reschedules, less stress for scanning techs due to less surprises, increased throughput - less cold table time.
2. Non MR Personnel Training Video, test and class workshop.
3. Level 1 MRI safety video (Dr. Shellock) with test. Classroom workshop as well.
4. Many Policies and Procedures (Thermal Injuries and RF, Contrast Agent Safety, Acoustic Noise, MRI and Pregnant Patients, MRI and Pregnant Technologists and Tech Aides, Ferrous Objects and Accidents or "near" Accidents, Pediatric Sedation, Medtronic Spinal Cord Stimulators, Implantable Infusion Systems, Cardiac Event Monitors...)
5. Signage and Labeling of ancillary equipment.
6. Zone signage.
7. Monitoring of education with MRI safety for Level 1 and Level 2 Personnel.
8. Another technologist to attend MRSO safety course in Las Vegas in 2016.
9. Medical Director has made decision that a radiologist will be attending a class in 2016 as well...
10. Dedicated time for myself and other senior tech (she is going to Las Vegas) to research and approve implants/devices...

Our Medical Director and management has been very supportive. They have marketed my MRSO knowledge throughout the community. I have put together a proposal for a raise with a list of justifications and metrics. Management loves numbers...

For the most part, the entire company has been very receptive, of all the new MRI safety information, I have taught them and continue to help them grow in their professional careers.

**Our company has benefited, in many ways, but the most impressive to them has been the increase in volume and throughput due to no surprises with patient and implants. Over 90% of our patients that have implants are pre-screened and pre-approved which has decreased cold table time.**

One other very big concept, that my Medical Director, was very open to was that we now do patients with active devices/implants (Medtronic SCS, pain pumps, cardiac event monitors), no pacemakers yet. He is willing to learn MRI safety and the trust he has, in me, has been somewhat overwhelming. We have meetings and he is willing to listen and learn. He makes medical decisions when I need help and is very team oriented...

Dr. Kanal, I am sure I have already forgotten some of the information you taught me; however, **the information that I was able to retain... has been invaluable. The education, that you so generously taught me, has enhanced my professional career and has definitely made a positive impact within the company I work with."**

*This CME/CE activity is designed for Radiologists and/or other Physicians, Technologists/Radiographers, Physicists, Healthcare Risk Managers, MR Research personnel, and any other present and/or future MR Medical Directors or MR Safety Officers.*



## Comments From Past Attendees of Kanal's MRMD/MRSO MR Safety Training Courses

"Unbelievable how much I did not know!"

**"Jaw dropping. Dr. Kanal held my attention the entire time, including (the) poolside (chat) until 11 pm"**

"I have never been to a better presentation"

"Never stayed awake for an entire conference before!"

**"Motivating"**

"Informative; almost impossible to "zone out""

**"Firehose drinking that morphs into understanding"**

"Most "neurostimulation" I ever got from a CME!"

"This was my first experience with Dr. Kanal and he "blew my socks off" with his expertise and superb communications style!"

"Incredible!"

**"Best speaker I've ever heard!"**

"Dr. Kanal's passion for MR safety is infectious."

**"Overwhelmingly informative"**

**"The most knowledgeable professional I've worked with or learned from, ever."**

"New thinking and approach to MR safety"

"Shocking that there was so much that I did not know after 21 years in MRI"

"Overwhelming amount of great information"

"Simply amazing"

**Wow. Wow. Wow. Wonderful and educational.**

**Changing the way I look at our patients"**

"Stellar"

"He's one of a kind - thank you!"

"I've been through many a "snore fest" - but his sessions were interesting, intense, and thought provoking"

"One of the best conferences I've attended"

**"Dr. Kanal is a machine. He might actually be a cyborg!"**

"Extremely dynamic speaker"

"Allows us to think through problems"

"Mind explosion!"

**"Life changing!"**

"Packed full of eye opening information"

"Perfect balance of quality information and entertainment made it easy to follow and memorable"

**"Enormous amount of information. Thank you for changing the way I analyze MRI safety."**

"Excellent. Well worth my time and money. Novel way to think after 23 years doing MRI exams."

**"Should be mandatory for all doctors and technologists"**

"Amazing learning experience"

**"Your course was by far the most valuable to me in my years of radiology"**

"His attitude is very superconductive!"

"Amazingly refreshing"

"Fantastic! I have been a tech for 30 years. This session made me feel the wonder and excitement for our profession all over again!"

**"Phenomenal"**

"Very entertaining, never runs out of energy, brilliant speaker"

"The whole course was exquisite! I have learned so much, and also feel capable of explaining things to my colleagues who were unable to attend"

"Logical, methodical, understandable"

**"Dr. Kanal is an extraordinarily gifted communicator"**

"Couldn't be better"

**"Without a doubt, this is the best course I have ever attended."**

"Manny always exceeds my expectations"

"Extremely informative"

"Engaging and charismatic"

"Amazing even the second time around!"

## Comments From Past Attendees of Kanal's MRMD/MRSO MR Safety Training Courses

"I wish all my techs could attend."

**"I have never had so much information presented in such a way to keep me so interested."**

**"It should be called, "MR safety de-mystified!"**

"Incredibly interesting and informative!"

**"Excellent, informative, interactive, entertaining, educational. His passion shows - it is contagious. He is incredible...Amazing**

"A passionate instructor equals a passionate student. His enthusiasm is contagious!"; "10++++"

**"If you are considering the Kanal safety officer course, stop thinking about it and just do it! You will not regret it!"**

"My head is swimming!"; "Overwhelming!"

**"It was like drinking from a fire hydrant. I highly recommend it!"**

"It's Manny... need I say more?"

**"Everyone involved in patient care in MRI should participate"**

"10 - there aren't words sufficient to explain this!"

**"By far the best meeting I have ever attended... Wow!"**

"Excellent, passionate, fun!"; "Off the scale - just listen to him!"; "Terrific - cannot get enough"

"Excellent course - far better and engaging than I was expecting!"

**"Intense but awesome. Dr. Kanal is incredible. You are captivated by his enthusiasm and knowledge."**

"Will change my practice - I learned more than I was aware was out there."

**"Holy cow!"**

"Dr. Emanuel Kanal is the Yoda Jedi Master. Period. End of story."

**"Dr. Kanal has the ability to make the invisible - visible."**

"Dr. Kanal has the unique ability to impart information in a way that keeps us interested and thinking for ourselves."

"Captivating... entertaining... mind blowing"; "Excellent course - far exceeded expectations"

**"Shock and Awe. Shock: How little I knew. Awe: How my MR Techs have done such a superb job for 20+ years."**

**"Best individual speaker conference I have been to in 27+ years."**

**"...never in all my years have I seen this - so much info here!"**

"Wonderful experience; highly recommended to other MRI personnel."

"Awesome!! Dr. Kanal exceeded my expectations!"

**"Magnificent!"**

"Engaging. Energetic. Interactive. Spontaneous."; "Everything I expected and more!"

"...far exceeded my expectations. I'm looking forward to sharing with my staff and administrators."

**"I would highly encourage every manager and or safety officer to make it a priority to attend one of these meetings."**

**"On a 1 to 10? 15 - Best I've ever seen!"**

"Most dynamic and engaging speaker I have experienced in a radiology setting!"

"Excellent as always - enlightening and entertaining. Incredibly invaluable education."

"Completely speeches!"

"Excellent - my favorite seminar!"; "Exceptional, amazingly informative"; "Unbelievably fantastic!"

"Incredible information!"; "Captivating"; "Unbelievable"; "Best MR conference ever!"; "Astonishing!"

"Well worth the time and money. I am much more confident my safety skill set."; "Absolutely without a doubt I am a better tech because of Dr. Kanal's conference"; "Completely blew my mind"; "Dr. Kanal is captivating";

**"I think I love him..."**



# Registration Form (Please Print - This form may be copied)

<i>Please check conference that applies:</i>		<i>Please check fee that applies:</i>		
<input type="checkbox"/> <b>Kanal MR Safety: Las Vegas, NV</b>	<b>March 19 - March 22 The Luxor Hotel and Casino Las Vegas, NV</b>	<b>Early</b> <input type="checkbox"/> \$1550/Physician <input type="checkbox"/> \$1175/Physicist <input type="checkbox"/> \$800/Technologist	<b>Standard</b> <input type="checkbox"/> \$1600/Physician <input type="checkbox"/> \$1225/Physicist <input type="checkbox"/> \$850/Technologist	<b>Late</b> <input type="checkbox"/> \$1650/Physician <input type="checkbox"/> \$1275/Physicist <input type="checkbox"/> \$900/Technologist
<input type="checkbox"/> <b>Kanal MR Safety: Washington, DC</b>	<b>July 23 - July 26 Hilton Washington Dulles Airport Washington, DC</b>	<input type="checkbox"/> \$1550/Physician <input type="checkbox"/> \$1175/Physicist <input type="checkbox"/> \$800/Technologist	<input type="checkbox"/> \$1600/Physician <input type="checkbox"/> \$1225/Physicist <input type="checkbox"/> \$850/Technologist	<input type="checkbox"/> \$1650/Physician <input type="checkbox"/> \$1275/Physicist <input type="checkbox"/> \$900/Technologist
<input type="checkbox"/> <b>Kanal MR Safety: Orlando, FL</b>	<b>October 15 - 18 Sheraton Orlando Lake Buena Vista Resort Orlando, FL</b>	<input type="checkbox"/> \$1550/Physician <input type="checkbox"/> \$1175/Physicist <input type="checkbox"/> \$800/Technologist	<input type="checkbox"/> \$1600/Physician <input type="checkbox"/> \$1225/Physicist <input type="checkbox"/> \$850/Technologist	<input type="checkbox"/> \$1650/Physician <input type="checkbox"/> \$1275/Physicist <input type="checkbox"/> \$900/Technologist

**Registration is also available Online at: [www.nwforums.com](http://www.nwforums.com)**  
*Note — Registration is confirmed and processed only when payment is received.*

Name (print) \_\_\_\_\_

Email Address (print) \_\_\_\_\_

*Note: Email address is required for confirmation purposes.*

Facility \_\_\_\_\_

The address below is (circle one):      Work      Home

Street \_\_\_\_\_

City \_\_\_\_\_ State \_\_\_\_\_ Zip code \_\_\_\_\_

Day Phone (\_\_\_\_\_) \_\_\_\_\_ (circle one)      Work      Home

Payment enclosed or amount charged to credit card \$ \_\_\_\_\_

Charge to:    ☐ VISA    ☐ MasterCard    ☐ American Express    ☐ Discover

Card Number \_\_\_\_\_ Exp. Date \_\_\_\_\_

3-Digit Credit Card Security Code (found on back of card) \_\_\_\_\_

Name on Card (print) \_\_\_\_\_

Card Holder Signature (required) \_\_\_\_\_

**Make checks payable / send registration form to:**



**Northwest Imaging  
Forums, Inc.**  
**P.O. Box 25909**  
**Eugene, Oregon 97402**

**Please contact us to register or with questions:**

<b>Phone:</b> (888) 683-4930 Toll Free (541) 683-4930 Direct <b>Fax:</b> (541) 683-8499 <b>E-mail:</b> <a href="mailto:registration@nwforums.com">registration@nwforums.com</a> <b>Web site:</b> <a href="http://www.nwforums.com">www.nwforums.com</a>	<b>8am - 4pm M-F (PST)</b> <b>8am - 4pm M-F (PST)</b> <b>24 Hours a Day</b>
---	---