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PRESIDENT'S MESSAGE

Is our exam "outdated and irrelevant?"

Thank you so much for your responses and comments arising from the MDCB membership survey conducted in 2008. Of course the MDCB appreciated your positive feedback, but there were also some areas of concern which we are now striving to address. Perhaps the most fundamental concern focused on exam content. This is an important discussion point for all of us since the quality of our exam directly relates to our credential. Hopefully the information below will help to explain how the exam is evolving. Please keep sharing your thoughts and consider getting involved in some of the ways suggested below.

Does our credentialing exam reflect what we do?

Since 1989 the MDCB has conducted a Practice Analysis every 5 years. The purpose of this is to define the content domains of the exam and establish the content validity of our credential. Content validity refers to the extent to which the content covered by an examination overlaps with the important components of a job (tasks, knowledge, skills, or abilities). The MDCB worked closely with the team at Pro-metric (our test development company) to design our Practice Analysis to adhere to accepted professional practice and standards¹. The Practice Analysis takes a multi-method approach including focus groups with representative groups of subject-matter experts (dosimetrists) and a survey of both CMDs and AAMD members. A total of 710 surveys were completed this year, representing a response rate of 18.51%. Mean importance ratings were analyzed for tasks and knowledge that dosimetrists judged to be relevant (verified as important) to their work. Each task and knowledge statement was thus placed into categories to establish inclusion in (or exclusion from) the exam content specifications according to standard psychometric techniques. In addition to considerable demographic information describing our community of dosimetrists, the Practice Analysis has resulted in changes for the 2010 exam content weights as summarized on the following table.

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Exam Content Areas	Knowledge Statements	2005 - 2009 # Exam Questions		*2010 - 2014 # Exam Questions	
1. Radiation Physics	7	31	20%	25	16%
2. Localization	10	12	8%	16	10%
3. Treatment Planning	12	47	30%	47	30%
4. Dose Calculation Methods	7	39	25%	31	20%
5. Brachytherapy	7	8	5%	9	6%
6. Radiation Protection	5	3	2%	8	5%
7. Quality Assurance	7	5	3%	8	5%
8. Professional Responsibilities	6	3	2%	3	2%
9. Fundamentals of Computers	3	7	5%	8	6%
Total	64	155	100%	155	100%

*New Exam Content Weights After the 2009 MDCB Practice Analysis

The MDCB would like to thank the many dedicated dosimetrists who generously contributed their time and expertise to different aspects of the Practice Analysis process as; Task Force Committee members, survey pilot test participants, survey respondents, and Test Specifications Committee members. Also we would like to acknowledge the AAMD Board for their help in publicizing and disseminating the survey.

How are exam questions refreshed?

The MDCB routinely writes at least 100 new questions each year. These new questions are based on the most recent Practice Analysis results within the nine content areas. You might ask why we don't remove all older questions and replace them. In fact the Board does regularly review the question bank for relevance, reliability, and validity. 10-15% of questions on the exam each year are new – which is the maximum permitted by our psychometric requirements. This is because the remainder of the questions on each exam must have a statistical history of performance and difficulty level in order to ensure that the exam remains comparable from year to year. To facilitate the submission of new questions we are currently developing a new Web page to regulate the creation of new questions with respect to formatting and necessary information.

Why is the exam still on paper?

The MDCB is already preparing for computer-based testing (CBT), which is a major project that will be described in more detail later by Robert Adams, EdD, RT, CMD, the MDCB Test Development Chair. Apart from developing, testing and implementing the new process with Prometric, CBT will also require substantial changes to our documentation and policies etc. For example, questions may be presented in different orders for different candidates, thereby promoting exam security. Perhaps our greatest challenge however is increasing the size of our question bank to an appropriate size for CBT. The new process will be piloted in 2010 with a view to going live in 2011. We will keep you posted!

Will exam candidates ever get their results immediately?

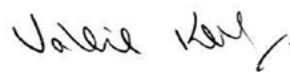
As a follow up to our Practice Analysis and in preparation for CBT, the MDCB is planning a “passing score study” for 2010. Similar to the Practice Analysis, Prometric will conduct this study according to accepted professional practice and standards. For some time our pass mark has been determined after each exam following extensive statistical tests by the psychometricians at Prometric. The passing score study will enable us to incorporate focus group opinion with statistics describing the difficulty levels of our exam questions and passing scores. This rigorous approach will hopefully enable future exam candidates to reap additional benefits of CBT. For example, the exam may be held more frequently or, when a candidate has correctly answered enough questions to pass the exam, the exam may automatically cease and immediately inform the candidate that they are successful. We have several phases of CBT implementation and years of work ahead before this becomes reality. However, we are laying the appropriate foundations so that when the time comes, we will be ready to use CBT to its full potential and be confident that our exam is still psychometrically valid.

How do I get involved?

The MDCB very much appreciates your ideas and comments. We would encourage you to participate in our surveys and submit new exam questions when this is requested. In the meantime, similar to the Practice Analysis process we will shortly be looking for volunteers to form a representative group for the “passing score study” webinars to be conducted by Prometric in 2010. This promises to be an extremely interesting opportunity for discussion with peers from the United States and around the world about the level of knowledge and skills required to become a CMD. Lastly, we regularly seek new Board members to continue the MDCB tradition of promoting our credential and profession, as well as bringing fresh perspectives and ideas. We look forward to hearing from you!

It is my great pleasure and honor to serve the MDCB as President for this year (from September 1st 2009 until August 31st 2010). All I can say is that I am very fortunate to have such a talented and dedicated team of Board members and staff working with me. If you have just become a CMD in 2009 – congratulations and welcome! Also as we begin the 2010 exam cycle, the MDCB would like to wish our applicants all the very best. Finally, I would like to send my warmest regards to all of you, in the United States, Canada and overseas.

Respectfully submitted,



¹American Educational Research Association, American Psychological Association, National Council on Measurement in Education. (1999). *The Standards for Educational and Psychological Testing*. Washington, DC: American Psychological Association.

MDCB PARTICIPATES IN FALL ALLIANCE MEETING

MDCB Board of Director members Beverly Riley and James Harter attended the recent Alliance for Quality Medical Imaging and Radiation Therapy (AQMIRT) Fall Meeting in Albuquerque, NM, October 25-27, 2009. Representatives from the approximately 20 organizations were provided an update on recent activity in the 111th Session of Congress and strategized on efforts to either have a stand-alone bill passed, or include core CARE Bill language in the final version of health care reform legislation (HCR).

The meeting was facilitated by Christine Lung, Vice President of Public Relations and Public Policy for ASRT. Lobbyists Dave Goch (Webster, Chamberlain & Bean/general counsel-lobbyist in House) and Bill Finerfrock (Capitol Associates/Lobbyist in Senate) were on hand to inform attendees of the issues related to passing the CARE Bill:

- Difficulty to focus on quality of care issues when health-care reform is directed toward finances and other massive issues.
- Affect of the loss of Senator Edward Kennedy on CARE activity and other stand alone legislation
- Diversion of previous legislative champion's attention to other issues.

Additional co-sponsors of the bill are needed within the next two weeks. Financial information may be crucial in widening Congressional support. Organizations having data to support 'quality saves money' were asked to share it.

In addition to the discussion concerning the CARE Bill, the issue of position statements on Healthcare Reform was deliberated. It was the consensus of meeting participants that the Alliance develop a position statement. Feedback from all member organizations was solicited.

The Alliance will continue to keep the members abreast of any developments regarding the CARE Bill. ■

MDCB PRESENCE AT AAMD CONFERENCE



The 2009 AAMD conference in Scottsdale, Arizona, "Shifting to a New Era," was highlighted by a presentation by the MDCB Test Development Chair, Robert Adams, EdD, RT, CMD. Dr. Adams'

lecture, *The MDCB Examination: A History*, provided background about the exam and the importance of certification.

The MDCB was incorporated in 1988 to create and implement standards of certification in medical dosimetry. The exam is administered once annually during and at the AAMD Conference and in locations throughout the United States, Canada and a number of international locations.

Dr. Adams stressed the importance of certification. The MDCB, like other certification boards increases the validity of the profession by advancing the standards and determining competence in health care delivery for the individual practitioner and for the benefit of society.

A copy of the presentation is available on the MDCB Web site, http://www.mdcb.org/examinfo/MDCB_Exam_A_History.ppt.

For the first time, the MDCB was a participant in the Exhibit Hall of the AAMD Annual Conference. Many prospective CMDs and current CMDs visited the MDCB booth to learn about the exam and to ask questions about CMD issues.

The MDCB would like to extend a warm thank you for the hospitality and opportunity extended to us by inviting our participation. The experience was a benefit to the association, as well as to our members and prospective members.

ROBERT ADAMS IS AWARDED AN NCI GRANT

MDCB is proud to announce the award of a National Cancer Institute R25 grant (1R25CA134307-01A1) to Robert Adams, EdD RT, CMD, the MDCB Test Development Chair. Robert is Assistant Professor, UNC Department of Radiation Oncology and Director, UNC Radiation Therapy and Medical Dosimetry Education Programs. The purpose of this million dollar grant, *The Design, Implementation, and Evaluation of Computer Based Medical Dosimetry Clinical Education Learning Modules Utilizing the Plan UNC Medical Dosimetry Software Planning System*, is to translate components of didactic medical dosimetry educational training for both radiation therapists and medical dosimetrists into a computer-based clinically based modular format. This multi-disciplinary project utilizes the expertise of doctoral level educators, psychometricians, medical physicists, computer scientists, and radiation oncology physicians coupled with certified medical dosimetrists (CMD) and radiation therapists RT(T). The grant helps better familiarize medical dosimetry and radiation therapy students and practitioners with the medical dosimetry software tools used in clinical practice for radiation therapy treatment planning. These modules include designed case studies, assessment and evaluation tools, and links to external resources for further topic study. This grant proposes for the first time a computer-based module version of

medical dosimetry clinical training, that has the potential to become a model for medical dosimetry clinical education training both nationally and internationally.

Both the American Association of Medical Dosimetrists (AAMD) and the American Association of Radiologic Technologists (ASRT) wrote letters of support for this grant. Additionally, four radiation therapy programs also provided letters of support of the grant: Howard University, California State Long Beach University, The Medical College of Georgia, and Virginia Commonwealth University.

Once developed the computer based training modules will be offered to its communities of interest free of charge. Potential users include radiation therapy students and programs, medical dosimetry students and programs, radiation therapy practitioners, and medical dosimetry practitioners. Eventually, the user base will expand.

Dr. Adams' R25 grant funding began September 15, 2009. It is believed that this is the monetarily largest National Institutes of Health or National Cancer Center Federal Research Grant ever awarded to a radiation therapist (T) or medical dosimetrist (CMD) who is the primary investigator.

If you have any questions about the grant, please contact the primary investigator (PI): Dr. Robert D. Adams, Robert_adams@med.unc.edu. ■

MDCB WELCOMES NEW BOARD MEMBER



The MDCB welcome Beverly Riley, RT, CMD as the new AAMD representative of the MDCB of Director. Beverly began her 5 year term on September 1, 2009. In her career, she serves as the Clinical Supervisor of Medical Dosimetry at the University of Texas, M.D. Anderson Cancer Center, Houston, TX, where she leads the proton therapy medical dosimetry team.

A graduate of Oklahoma University, Beverly received her BS in Radiologic Sciences. In addition to her CMD certification, she is American Registry Radiation Therapy (ARRT) certified and is active in both the American Society of Radiologic Technologists (ASRT) and the American Association Medical Dosimetrist (AAMD). She served as the Public Relations Chairperson of AAMD from 2002-2007 in addition to her service on the AAMD Annual Conference Committee.

Beverly has many professional achievements. She has written numerous articles, some award-winning, for professional journals, including *RT Image Magazine*, the *Journal of Radiology Nursing* and the *International Journal of Radiation Oncology*.

2009 EXAM STATISTICS

The 2009 MDCB exam was offered in 14 locations throughout the United States, in Toronto, Canada and Kowloon, Hong Kong.

- 394 applications were accepted for the 2009 exam, 11 were rejected for not meeting all of the requirements.
- 344 candidates challenged the exam on June 21, 2009
- 204 candidates passed the exam
- The pass rate was 59%
- The raw cut score for passing was 89 correct out of 155

Additionally, she has often been a presenter at professional conferences.

Born in Valdosta Georgia at Moody Airforce Base, Beverly was raised in Florida. She is one of four sisters. After attending college in California and working in real estate for a number of years she returned to college where she pursued a career in radiation therapy. Beverly worked as a therapist for several years while learning to become a medical dosimetrist. When not at work, Beverly enjoys reading, gardening, running, knitting, red wine and spending time with friends. ■

CE CENTER UPDATE

DIRECTED READINGS FROM THE AAMD & ASRT

If you have completed a directed reading (also known as journal quizzes, self studies, etc.) from the journals of the AAMD or the ASRT, you can add those CE credits to your MDCB transcript, if they are approved by the MDCB. Most AAMD and ASRT directed readings ARE MDCB approved!

The AAMD directed readings are always numbered in a sequential way and offered 8 times a year. Their numbering system is easy to decipher – for example, the first directed readings in 2009 were numbered 34-1 and 34-1A. The second group of readings was numbered 34-2 and 34-2A, and so on. Usually, the AAMD will assist CMDs by adding the MDCB approval numbers to their directed reading lists and proof of completion.

Directed readings featured in the ASRT journal are identified by a different numbering system that varies with each reading. The ASRT usually does not include the MDCB approval number on their print outs, or proof of completion, so it takes a little more work and research for you to add the course to your personal transcript.

Keep in mind that the numbering systems described above are the numbering systems for those 2 specific organizations. You'll need to have the 6-digit MDCB approval number OR the title of the reading to be able to add it to your MDCB transcript at the CE Center.

If you have questions, please contact the CE Center:
mdcb@cmehelp.com.

CMD VERIFICATION

Organizations or individuals can verify active CMDs' credentials by visiting the MDCB Web site, www.mdcb.org. On the home page there is a menu item on the left hand side of the page labeled "CMD Verification". By clicking on this menu item, users will be linked to the verification page and asked to search for CMDs by first and last name. Search results for active CMDs will provide a printable page that indicates the name of the CMD, the expiration date of the current status along with the member identification number and date the individual passed the exam.

ARRT RCEEM

MDCB is an approved American Registry of Radiologic Technologists (ARRT) Recognized CE Evaluation Mechanism (RCEEM). All CE activities that are approved by the MDCB and that are relevant to the duties and responsibilities of a Radiation/Therapist Dosimetrist will be awarded ARRT Category A Credit. Additionally, ARRT does award 24 category A credits for the initial MDCB certification exam. ■

MDCB APPROVES TEMPORARILY DISABLED POLICY

The MDCB Board of Directors approved a Temporarily Disabled Policy at the MDCB August 2009 Board of Directors Meeting. The policy has been reviewed by legal counsel and is incorporated into the policies that govern the Continuing Competence Documentation Program Committee. The new policy addresses the need to provide extensions for completion of CE credits to CMDs who are temporarily disabled and unable to be employed as medical dosimetrists or to complete required CE:

Temporarily Disabled Policy

1. Certified Medical Dosimetrists (CMD) who are temporarily disabled and therefore unable to be employed as a medical dosimetrist or to complete required continuing education (CE) to maintain CMD status may apply for temporarily disabled status in writing addressed to the MDCB President.

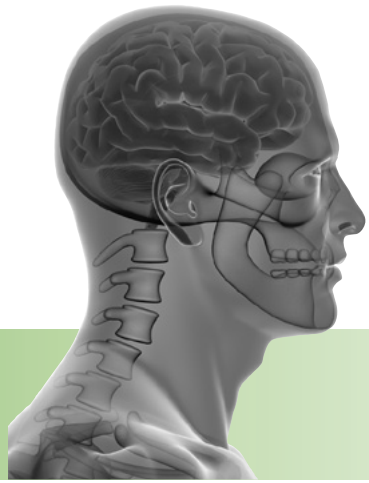
2. Verification of disabled status by a licensed physician must be provided.
3. The CMD will be required to sign an agreement not to engage to any extent whatsoever in the provision of medical dosimetry services during the disabled status period.
4. During the period of disabled status, the CMD must continue to maintain the CMD credential fee.
5. If during the disabled status period, the CMD is unable to complete the 5 year/50 credits requirement, an extension of time to complete the requirement shall be provided. The length of any such extension of time shall be at the discretion of the MDCB Board of Directors. Any extension of time due to temporary disability shall not impact the CMD's next following 5 year period for completion of an additional 50 CE credits.
6. Verification by a licensed physician of ability to return to employment will be required.
7. Temporarily disabled CMDs who are granted extensions under this policy but who fail to complete the CE requirement by the extension date shall have their certification revoked and will be required to retake and pass the CMD certification examination and meet all other eligibility requirements in order to regain CMD status. ■

CARE BILL INTRODUCED IN THE 111TH CONGRESS

The Consistency, Accuracy, Responsibility and Excellence in Medical Imaging and Radiation Therapy (CARE) Bill (HR 3652) was introduced in the House of Representatives in late September by Rep. John Barrow, D-GA. The CARE Bill would require basic educational and certification standards for health care personnel providing, planning and delivering all medical imaging examinations and radiation therapy.

We urge you to contact your local representative today. Ask them to contact Hill Thomas in Representative Barrow's office and sign on as a cosponsor of HR 3652 to advocate for safe, competent and cost effective patient care. To determine the representative in your area, please visit <http://capwiz.com/asrt/dbq/officials/>. ■

ROUTES TO ELIGIBILITY FOR THE 2010 EXAM



At the MDCB Board of Directors Summer Meeting the following routes to eligibility were determined. The eligibility requirements outlined reflect the educational and experiential requirements needed to sit for the exam.

ROUTE 1

To apply under route 1; you must meet the following requirements:

Graduated from a JRCERT accredited program of at least 12 months. Also, before March 1st, 2010, an additional 6 months clinical medical dosimetry experience* must be completed under the direction of a certified medical dosimetrist or medical physicist or radiation oncologist.

OR

Graduated from a JRCERT accredited program of 18 months or greater before March 1st, 2010. This is equivalent to a total minimum of 12 months of education and 6 months of clinical medical dosimetry experience.

A current listing of JRCERT accredited dosimetry programs can be found online at <http://www.jrcert.org/index.html>

ROUTE 2

To apply under route 2: you must meet the following requirements:

Have a Bachelors Degree (BS) in a related science. *Transcripts will be reviewed to ensure evidence of minimum course work in general or medical physics, physiology, anatomy, precalculus or calculus mathematics. Related science degrees may include but are not limited to chemistry, mathematics, biophysics, dosimetry, radiation therapy or radiologic science, etc.*

OR

Hold an active registration with the ARRT in radiation therapy or foreign equivalent.

AND

Completed at least 24 months clinical medical dosimetry experience* (before March 1st, 2010) under the direction of a certified medical dosimetrist or medical physicist or radiation oncologist.

AND

Completed 12 CE credits approved by the MDCB during your 24 months clinical experience.

ROUTE 3**

To apply under route 3; you must meet the following requirements:

Have an Associates Degree (AAS or AS) or Have a Bachelors Degree (BA) in any subject (Arts, English etc.).

AND

Completed at least 36 months clinical medical dosimetry experience* (before March 1st, 2010) under the direction of a certified medical dosimetrist or medical physicist or radiation oncologist.

AND

Completed 12 CE credits approved by the MDCB during your 36 months clinical experience.

**Clinical medical dosimetry experience is defined as full-time experience in a clinical setting treating patients, not concurrent with dosimetry schooling. This does not include corporate/vendor experience.*

*** Effective for 2013 exam applications, Route 2 and 3 eligibility criteria will change and merge into a single eligibility route. ■*

JRCERT APPROVES MEDICAL DOSIMETRY MASTER'S DEGREE PROGRAMS

The Joint Review Committee on Education in Radiologic Technology (JRCERT) has awarded the following educational institutions JRCERT accreditation of their master's degree program in medical dosimetry:

Medical College of Georgia
Augusta, GA

University of Oklahoma Health Sciences Center
Oklahoma City, OK.

Initial accreditation is granted for a period of three years.

The JRCERT is the only agency recognized by the U.S. Department of Education for the accreditation of traditional and distance delivery educational programs in radiography, radiation therapy, magnetic resonance, and medical dosimetry. Accreditation awarded by the JRCERT offers institutions significant value by providing peer evaluation and by assuring the public of quality professional education in the radiologic sciences.

For a complete list of JRCERT approved programs, visit www.jrcert.org. ■

AAMD CALL FOR SPEAKERS

The 2010 Administrative Conference Committee of the American Association of Medical Dosimetrists (AAMD) is soliciting abstracts from potential speakers for the AAMD 35th Annual Meeting, June 13 – 17, 2010 in Minneapolis, MN.

To submit your abstract, please visit the new AAMD Online Abstract Submission site at:

https://www.regonline.com/aamd_2010_call_for_papers

You will be asked for:

- Your Name and Contact Information
- Title of Your Proposal
- Presentation Category
- Session Type
- Names of Additional Presenters
- Abstract (350 words or less)
- Learning Objectives
- CV of primary presenter

Submission deadline: December 1, 2009

The Education Program Subcommittee will select speakers for the Annual Meeting from all abstracts submitted.

For questions regarding abstract submission, please send an email to: Minneapolis2010@medicaldosimetry.org

We look forward to hearing from you!

**AAMD Administrative Conference Committee
Education Program Subcommittee ■**

PROFESSIONAL RESPONSIBILITY

As a recognized member of the health-care field providing critical care to individuals facing life-threatening illnesses, it is the sole responsibility of each Certified Medical Dosimetrist to adhere to the MDCB Ethical Standards, renew his/her credential annually, including maintaining the appropriate number of continuing education credits each cycle in the MDCB CE Center and make necessary updates to personal contact information on the MDCB Web site. The CMD credential is to be renewed by December 31 of each calendar year.

Renewal fees submitted after December 31 will be subject to a \$20 late fee. Failure to submit this renewal fee by January 31 of any calendar year will result in loss of the CMD credential. A minimum of 50 MDCB-approved continuing education credits must be completed and downloaded to individual transcripts in the MDCB CE Center for each 5-year period that the Certified Medical Dosimetry credential is maintained.