Effective Strategies for Planning and Facilitating Morning Report

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For decades, morning report (MR) has been a central component of graduate medical education around the world, from Iran[1] to Australia.[2] MR is the predominant term for a case-based conference in which a chief resident (CR), senior resident, or faculty member guides residents and students through a discussion about a patient case or cases. It has been rated by residents as their most valuable educational activity.[3] While predominantly in internal medicine programs, MR also exists in emergency medicine,[4] pediatrics,[5] surgery,[6] and psychiatry[7] programs, in both inpatient and ambulatory[8,9] settings.

Despite its preeminence in medical education, there is little research highlighting the skills required to conduct MR effectively. Moreover, the COVID-19 pandemic, and the accompanying transition to more virtual learning, has threatened to diminish the success of this important teaching venue.

In the following Perspectives piece, we draw upon our own extensive experience, as past CRs and as faculty who train CRs in facilitating MR, to provide a pragmatic literature-informed summary of specific strategies that one might employ when leading MR, whether in-person or virtually. We have organized these strategies into 2 broad themes: (1) preparation and planning, and (2) strategies for facilitation.

Theme 1: Preparation

Recommendation 1.1: Select and Master the Case

In preparing MRs with planned cases, one should expose learners to varied content, including inpatient and outpatient themes, as well as common and rare diseases. Some have further suggested that cases should be relevant, realistic, engaging, challenging, and instructional.[10]

Once a case is identified, we encourage the MR leader to master the case. Read through the chart, from the emergency department encounter notes to the discharge summary. As you do so, write down clinical questions that arise. Next, read articles that will answer these questions. Take notes on what you learn, highlight key points, and draft questions that may facilitate learning during MR. Finally, outline how you will spend your time, in specific intervals, so that you stay on track.

Recommendation 1.2: Define Your Learning Objectives

Time is limited in MR. Reviewing all teachable aspects of a case within 30 to 60 minutes would be an unreasonable expectation. Instead, one might focus on building a differential diagnosis or outlining disease management. Alternatively, you may target practical skills like physical examination maneuvers, blood gas interpretation, or motivational interviewing techniques. Some have suggested broadening objectives to include cost-effectiveness,[11] end-of-life communication skills,[12] or preparing junior residents to respond to on-call emergencies.[13]

Recommendation 1.3: Set the Stage

Use strategic planning in arranging the conference room.[14,15] Confirm beforehand that all technological equipment, virtual platforms, and audiovisual aids are working. Residents should ideally be seated around a central table; they are the key participants of MR, and this arrangement encourages equal participation. Attendings should be invited to sit along a back or side row. Their presence sends the message that MR is a valued learning activity, and their expertise can be of practical benefit. The facilitator should be positioned in the front of the room with the ability to view the board and observe all participants.[15]

Recommendation 1.4: Manage Your Time

MR leaders should encourage punctuality by beginning the report on time. Consider using the first few minutes to prime learners with relevant board review questions so that late-arriving learners don't miss important case details.[16] Move quickly through introductory case details to focus on learning objectives. Check the clock to ensure adequate time for closure and end MR on time.

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Recommendation 1.5: Embrace Innovative Teaching Strategies

We encourage MR leaders to consider unique methods of structuring MR to enhance teaching. Examples include:

- Devise a game in which residents compete to recall knowledge reviewed at recent MRs. Such strategies can increase learner engagement and can increase the appeal of report.[17,18]
- To highlight practice-based learning, incorporate on-the-fly literature searches to address clinical questions, perhaps with the assistance of a medical librarian.[19,20] This may also bolster appreciation of local library resources[21] and even decrease length of stay for admitted patients.[22]
- Consider inviting a patient to the session, as hearing their perspective can be invaluable. It is best to advise residents in advance that a patient will be present.
- Incorporate virtual platforms, which have grown as a result of the COVID-19 pandemic.[23,24] Facility with such platforms can increase accessibility and provide opportunities to enhance diagnostic reasoning skills.[25]

Theme 2: Facilitation

Recommendation 2.1: Create a Safe Climate for Group Learning

A safe learning climate is crucial to efficient knowledge acquisition.[16] A toxic learning climate can dampen learner participation, promote a competitive atmosphere, and threaten the potential for community-building within a residency program.[26,27] Strategies include:

- Treat learners as peers. The hierarchical nature of medicine can discourage learners from offering their own views when they differ from others.[28] Simple strategies like using participants' names let learners know that their presence and opinions are valued.[14]
- Use language that is affirming and inclusive. Highlight the social determinants of health in MR cases and the inequities that impact health outcomes.
- Consider priming faculty with specific instructions on how to contribute most constructively. Faculty are a welcome addition to MR, but only when their presence contributes to a safe learning climate.[29]
- Demonstrate humility regarding your own knowledge gaps. Sharing that you do not know something is healthy; ask others in the room for the answer, assign an investigator during the session, or circle back after MR with a response.[30]

Recommendation 2.2: Use the Tools in Your Toolbox

Remember that you may have teaching allies in the room. Call on a resident "expert" to share their knowledge, warning them in advance as appropriate and welcoming other contributions. Attendings also appreciate the opportunity to share their expertise. Consider inviting an inpatient pharmacist or subspecialist to MR.[31]

Employ a variety of teaching modalities—audio, visual, tactile, experiential, etc. Use PowerPoint slides sparingly—approximately 5 to 10 in number—to highlight key points. Hand out a relevant table from a medical journal. Play a video that demonstrates an examination technique or shows illustrative radiographic findings. While external content is useful, sketching diagrams in real time can also be valuable.[32,33]

Recommendation 2.3: Embrace Learner-Centeredness

Adults learn best when they teach one another and interact with the content. Consider the following:

- Establish the relevance of your topic by defining learning objectives a priori and starting with a believable hook. Like telling a compelling story, place your learners into the middle of the most challenging and provocative time point in the patient's narrative.
- Engage all participants in the learning process. Selectively redirect questions from one learner back to the group. Breakout rooms on video-conferencing platforms are useful for promoting micro-group discussions with 2 to 4 learners. This ensures that learners are teaching one another.
- Be flexible in addressing learners' questions as they arise, while not straying too far from your original plan.

Recommendation 2.4: Ask Questions That Foster Clinical Reasoning

MR is an ideal venue for promoting clinical reasoning skills through "higher order" questioning and active participation.[34-37] Examples include:

- After presenting key details of the case, solicit a volunteer to offer an assessment. This is a critical exercise in synthesis.
- Seek out areas of confusion and paradox: "Why would we want to give steroids, an immunosuppressant, to this patient with an overwhelming infection?"
- Encourage learners to challenge the prevailing view: "The diagnosis on admission was CHF exacerbation; what conflicts with this view?" Have learners engage in a mock debate, critically assessing one another's impressions.
- Promote self-reflection by asking how learners' initial thoughts may have evolved: "In retrospect, why do you think we missed ischemic colitis?"
- Inject an occasional moment of silent reflection. Doing so helps to give all learners the opportunity to grapple with challenging questions.[15]

Recommendation 2.5: Hug the Case

Discussions during MR can, and should, move in different directions, but one should guide conversation back to the patient at hand. This preserves case-based learning, solidifies knowledge acquisition, connects theory to practice, and makes MR more enjoyable.[38]

Recommendation 2.6: End on the Right Note

Consolidation of new material at the end of MR is often neglected, yet repetition and application are essential for consolidating new knowledge.[39] Never introduce new content in the last 5 minutes of MR, as learners may fail to consolidate prior teaching points. Ask each participant to share one thing they learned with the group. Present a summary slide with take-home points and related board review questions.

In Summary

MR is a unique educational setting, with its case-based learning format, potpourri of learners, oversight by attending physicians, and potential to focus on countless topics. As such, it necessitates unique skills. Despite the emergent challenges of teaching during a pandemic, we believe the strategies above will serve as a helpful guide to leading a successful MR. We recommend that leaders partner with peers and attendings for feedback on MR throughout the year. Leading MR is a tremendous opportunity to further one's medical knowledge, engage with the residency community, and grow as a medical educator.

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