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CONCEPT

The coaching approach in graduate medical education: Practical considerations for program creation and implementation

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Abstract

Coaching supports many aspects of competency-based medical education, particularly by providing individualized instruction throughout the duration of the training experience. Many of the current recommendations regarding coaching have been established at the undergraduate medical education (UME) level. Although medical training is ideally envisioned as a continuum, trainees in graduate medical education (GME) are exposed to different learning environments, assessment processes, and sometimes more limited resources (institutional vs. departmental funding, personnel, and space) and time than their UME counterparts. These differences have important implications for the coaching approach needed for GME trainees. There are few papers that describe the specific trainee, residency program, and faculty coach characteristics to consider when designing a residency coaching program as well as the difference between a traditional coaching model and a coaching approach in medical education. The authors aim to specifically address coaching in GME and provide practical considerations for creating and implementing a coaching program for residents. Readers can use this as a framework to determine trainee-, program- and institution-specific needs when considering a coaching program for GME trainees.

INTRODUCTION

Coaching in medical education is a partnership between a coach and a learner that seeks to foster learner motivation, encourage self-reflection, and create learner-centered plans to achieve trainee professional and personal potential.[1] Mentorship and career advising, while also crucial to a trainee's professional development, are different from coaching in that a hierarchy remains in the relationship and neither focuses primarily on the trainee's individual perceptions or lived experiences.[1] Coaching has been prominent in the sporting and business sectors for decades[2–4] and has been held to a professional global standard by the International Coaching Federation (ICF) since its formation in 1995. Coaching is becoming increasingly popular in medical education as it aligns with several core components of competency-based medical education (CBME), including competency-focused individualized guidance and programmatic

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assessment.[5,6] Coaching also assists with trainee development of metacognitive skills for continuous self-regulated learning (master adaptive learner behaviors), which critically prepare trainees for lifelong self-directed learning.[6,7]

Coaching in medical education has been demonstrated to improve learner well-being, resilience, nontechnical skills, and technical skills.[8] Many resident coaching programs focus on well-being initiatives that have proven to improve burnout and self-compassion,[9–13] optimize meaning in work,[14] foster professional growth,[13,15] and encourage higher coping skills.[10,16] Such programs have also resulted in better workplace communication and working relationships.[11,16,17] Residents have also positively viewed these coaching endeavors, self-reporting an improvement in confidence with communication skills[17]; more self-identified opportunities to reflect on own performance and set personal goals[17]; a positive perception of coach feedback being purely formative[18]; an ability to better manage imposter syndrome[11]; and many reporting that they would recommend similar programs to other residencies.[12,19]

The majority of existing literature on coaching in medical education focuses on each individual institution's approach to and experience with building and implementing a program for their own trainees.[9,14,16,19–22] Few practical and relevant resources exist that provide recommendations on logistical considerations for designing and implementing a coaching program in medical education[23–28]; even fewer of these resources specifically focus on coaching in graduate medical education (GME).[29] Furthermore, there is a paucity of literature pertaining to coaching use in emergency medicine (EM),[30] which arguably could be one of the specialties that benefits most from this approach given up-trending rates of physician burnout[31]; increasing patient acuity and volume; and shift work that is oftentimes disruptive to sleep cycles and nonclinical life demands.[32]

Here, we discuss practical considerations and recommendations for designing and implementing a coaching program for GME based on current literature and our early experiences as a select group of EM residency programs who have implemented a formal coaching program or are utilizing a coaching approach with our resident trainees.

METHODS

The author group was identified from sites participating in the EM CBME Implementation Reimagining Residency grant that were known to have existing residency coaching programs in 2024. This American Medical Association grant was presented as the education keynote at the Society for Academic Emergency Medicine (SAEM) 2024 Annual Meeting. Authors were chosen for content area expertise and practical experience with implementing and/or revising a residency coaching program in the past 3 years. A table with additional author qualifications is listed in Appendix A.

An extensive literature review was performed prior to the development of the primary author's coaching program and this was further supplemented by best available evidence by the author group. Where possible, evidence-based recommendations are cited; additional recommendations represent the expert consensus of the author group.

TRADITIONAL COACHING VS. A COACHING APPROACH

Prior to discussing the practical considerations of coaching use in GME, it is imperative to delineate the differences between traditional coaching and the coaching approach with medical learners.

Coach training

Many official coaching credentials require stringent coaching education, experience, performance evaluation, and knowledge/skills examination to uphold legitimacy and standardization of the training process.[33] This rigor ensures all core competencies and skills are met. Professional training programs are oftentimes expensive and time-intensive, with limited focus on use in medical education, making them an impractical option for programs seeking to train coaches on a large scale. Many coaching programs in medical education have thus created their own focused training curricula. Traditional coach training is rare in currently published programs, as illustrated below, and therefore it can be inferred that many of these physician-coach studies are using a coaching approach instead. A "coaching approach" embodies several key coaching principles and skills, but takes a more practical approach that translates well into the GME environment.[34,35] We use the term "coach" throughout this article with this definition in mind.

Coach expertise

The use of faculty physician-coaches will also inherently result in a difference between traditional coaching and coaching in medical education. While traditional coaches do not require any expertise in the subject matter discussed in coaching sessions, all faculty physician-coaches have completed medical school and residency training and will inherently have expertise in clinical skills and academic progression that the resident has not yet achieved. While such coaches can intentionally put aside their own expertise and experiences when entering into a coaching relationship with a resident, this distinction in approach from more traditional faculty roles (mentoring and advising) will need to be clearly understood by the faculty and clearly delineated with a resident prior to a coaching session.

Coaching relationship

Another critical difference is how the relationship is created. Many coaching relationships outside of medical education develop from

the coachee seeking out such a relationship, usually with a goal of improving in a focused professional or personal area. Unless coaching is a completely optional resource for residents, many programs will select coaches and targeted coaching applications for their residents. Because of this, the resident may find it more difficult to develop a trusting coaching relationship with a coach that was selected for them as part of a required program. Moreover, coaching relationships outside of medical education can be terminated by the coachee at any point should the coachee's expectations not be met. In resident coaching environments, however, this may not be an option depending on the structure of the coaching program. Programs should consider how to address circumstances in which a resident is in strong opposition to participating in coaching or scenarios where the coaching relationship degrades over time.

Confidentiality

Given the unique nature of a coaching relationship in medical education, the typical coach's agreement to maintain strict confidentiality may be unfeasible. Extenuating circumstances may arise in which a coach is concerned about a resident's physical or mental well-being and may break confidentiality to alert administrative leaders to support the resident in seeking additional resources,[36–38] such as mental health care. We recommend that programs and individual coaches set clear boundaries with their residents regarding how any information, including these special circumstances, might be shared or used by residency program leadership to avoid misunderstandings that could otherwise negatively impact the coaching relationship. These boundaries and guidelines should be set with attention paid to state employment laws and institutional policies on educational documentation.

RESIDENCY-SPECIFIC CONSIDERATIONS FOR THE COACHING APPROACH

Medical education at both the undergraduate medical education (UME) and the GME levels involve highly motivated learners, but there remain fundamental differences between the two educational environments. Training in UME usually entails grades and passing rotations whereas GME emphasizes achieving competency in knowledge and skills needed within the subspecialty; thus, goals for level of training may encourage different degrees of learner external and/or internal motivations. The diverse learning environments may provide learners with varying degrees of psychological safety as well, particularly if a learner is focused on rotation metrics and performing with an intention of obtaining recommendations (UME) rather than lifelong development for their career (GME). Lastly, educational strategies vary between UME (classroom-based blocks, end-of-rotation tests, objective structured clinical examinations) and GME (clinical teaching, in-service training examinations) training, which can greatly impact a learner's strategies for educational development and progress.

Beyond this, differences exist not only between UME and GME programs but also across GME programs. In EM specifically, there is significant variation in program format (3-year vs. 4-year programs, academic vs. community setting, number and type of clinical sites) and resource availability (faculty number, faculty time availability, program funding, etc.). It is important to elucidate all of these differences and adapt the coaching program to best serve specific resident needs and clarify strong foundational objectives for the individual program.

Coaching applications

We recommend that residency programs perform a local needs assessment to determine what gap a coaching program will bridge and clearly delineate program goals and objectives to inform program development. Common coaching applications in current literature include performance coaching (improving resident technical or communication skills, utilization of formative and summative feedback to progress in necessary competency domains) and psychological well-being coaching.[8] In Table 1, we provide an overview of selected coaching applications utilized within medical education as well as an example scenario in which each may be applicable. There are many other, often overlapping, applications of coaching and models that can be applied within coaching programs.[39–41]

As alluded to above, residency programs must consider if the coaching program will be a required or optional part of training based on intended program goals. A coaching program focused on developing individualized learning plans (ILPs)[42] or career development may be mandatory for all residents to provide each with similar opportunities and guidance. A coaching program primarily focused on resident well-being and self-actualization, on the other hand, may be offered as optional, allowing those who prefer other venues for wellness to opt out. Programs may also consider whether coaching all residents throughout the entirety of training or whether a more targeted approach, such as coaching only residents in remediation[43] or those in specific transitional stages (e.g., new interns, near graduation),[19] may be most effective for their needs.

Identifying a coaching champion

Residency programs will benefit from identifying a coaching champion (or group of coaching champions) who is committed to overseeing the creation and ongoing development of a coaching program, from conducting a needs assessment to faculty development to programmatic evaluation. Although an individual already involved in residency leadership (e.g., assistant/associate program director) may be best positioned to develop a program given their internal programmatic knowledge and protected time for educational initiatives, other faculty who are interested and invested in coaching may be able to meaningfully contribute to the development of a coaching program.

TABLE 1 Select coaching applications for use in GME.

Intent of coaching strategy	Example scenarios in GME
Leadership coaching	
Focuses on: • Understanding one's values and strengths that influence their leadership style • Developing change management skills fostering capability for effective team management[73]	Circumstance-specific: *Sarah is a newly minted chief resident who is struggling to work with two of her co-chiefs who have been at odds since the beginning of residency. The three have already had great difficulty in coming to decisions regarding the new intern orientation curriculum. Sarah wants to keep this private among her chief group, but she's not sure how to even begin to approach handling the conflict.* A coach can help Sarah identify her strengths and how she can best use them to successfully lead and manage conflict resolution within her chief cohort. Through coaching, Sarah recognizes that she values her ability to connect with her peers and is a "people person." Her coach facilitates the creation of her self-developed plan to sit down with her co-chiefs in a private meeting, facilitate a discussion between them in which they will each "seek first to understand" the interpersonal conflict, and then devise a plan with which they can all use their strengths and interests to contribute to the unified team.
Performance coaching	
Focuses on: • Performance improvement (technical and nontechnical skill development) and guiding learners to reach their fullest potential • Reviewing objective performance data and direct observation to inform the provision of meaningful feedback[8]	Technical skill development: *Sarah is a first-year resident who has not had the opportunity to perform many central venous catheter procedures, and the one she attempted today was difficult and unsuccessful. She is not sure how to improve her technical skill.* A coach can help Sarah by directly observing her procedural performance of a central venous catheter placement and identifying which specific steps (ultrasound optimization, probe manipulation, needle identification, physical steps of the procedure) she is struggling with. A coach can subsequently provide Sarah with directed feedback and targeted education to improve her skill. Nontechnical skill development: *Sarah is a rising second-year resident who has received consistent feedback that her presentations on shift are sparse and often miss the correct diagnostic workup. She's not sure what this means or how to improve.* A coach can help Sarah by providing more specific feedback by collating data from many resources. A coach can help Sarah self-identify the area she feels she's struggling most with (her differential diagnosis is limited due to gaps in clinical knowledge) and come up with a plan to help (1) build up her clinical knowledge and (2) translate this into her work up during presentations.
Professional development coaching	
Focuses on: • Supporting the "learner as expert" to facilitate actualization of learners' personal core values and passions • Supporting the learner to align the above with their purpose for pursuing a career in medicine • Broader, longer-term goals rather than specific goals in the context of academic coaching	*Sarah is in the beginning of her third year of residency (in a 4-year program) and is at a loss as to what the next step of her career should be. She notes that all her peers have a projected fellowship or job lined up as their next step and she feels stressed out and dejected.* A coach can help Sarah identify what brings meaning and fulfillment to her in her work. Sarah recognizes that she loves working with medical students and assisting with curriculum development around medical student educational initiatives. She will look into medical education fellowships after talking with the fellowship director at her program to further explore this potential opportunity.
Well-being coaching	
Focuses on: • Helping learners prioritize and develop capacity for making effective change within their lives • Helping to create a greater capacity for facing challenges in a productive manner	*Sarah is a second-year resident who is feeling burned out. She has not been swimming in 2 months (normally swims 4–5 times per week) and she has not been able to make it to any social events with her friends due to her clinical and academic schedule.* A coach can help Sarah reidentify what brings joy to her personal and professional life and how to take steps to reincorporate at least one of these joys (swimming) back into her day-to-day schedule. Sarah leaves the coaching session with the plan to swim at the sports facility on campus on days she starts work after noon, after which she'll drive into her shift.

Abbreviation: GME, graduate medical education.

The coaching champion, working with the residency program director, will be responsible for the creation of coaching program goals and objectives, logistics of implementation, delineation of roles between administrative and coaching responsibilities, and evaluation of the coaching program. The coaching champion may not need to have prior coaching expertise if alternative experts or resources can be identified to assist with faculty training for coach development.

Approach to coach selection

Published GME coaching programs have more commonly trained and used internal faculty physician-coaches[17,18,22,30,44–47] instead of using professional coaches[9,11] or physician-coaches from different departments.[10,12,48] Although external, professional coaches would likely best promote psychological safety according to traditional coaching principles (with use of external physician-coaches from other subspecialties/institutions being a good second option), the infrastructure and resources for this option are unlikely to exist in current GME models until coaching becomes more commonplace.[23] Thus, the use of internal faculty physician-coaches is a more logistically and financially feasible approach for new coaching programs. Furthermore, internal coaches will already possess familiarity with programmatic assessment and the residency's educational structure that will provide critical context when interacting with residents.[23,28]

Coaches acting as assessors

When implementing a coaching approach in GME, programs should consider whether coaches can also act as an assessor. While an assessor measures a learner's performance and progress based on educational objectives and competencies, a coach facilitates and supports a learner's self-reflection and goal creation.[49] In traditional coaching, it is advised to separate the role of coach from any evaluative role to maintain a coaching relationship that embodies trust, safety, and confidentiality without conflicts of interest.[50] This approach is upheld in the majority of UME coaching programs[51] and promotes a psychologically safe environment for the student to voice struggles and concerns without fear of repercussions on future assessments or career aspirations. This lessens the perceived power differential between learner and faculty by removing the assessor role from the dynamic.

When using internal faculty physician-coaches, however, this discrete separation of coach and assessor roles may be difficult to achieve in GME, as the majority of (if not all) clinical faculty generally serve in an assessor role for residents in the emergency department to some degree. However, this separation of roles may not be as necessary in GME as it is in UME. Residents are assessed on competencies and entrustment rather than traditional grades and may hold a higher intrinsic motivation to accrue clinical competency and skill during training.[52,53] Additionally, residents typically build closer and more longitudinal relationships with faculty during training. These factors may lessen the resident–faculty power differential and instill a sense of psychological safety in a coaching relationship with an internal faculty member. The coaches are also likely to be volunteers who are heavily invested in resident development with a desire to partner with them to improve their performance.[46] Thus, a trusted coach who is also an assessor may be able to provide context and lend evidence of validity to feedback discussed with residents.[18]

Baenziger et al.[47] adopted three separate coaching models: (1) the coach who also acted as a supervisor, (2) the coach who did not act as a supervisor but was a part of the clinical competency committee (CCC), and (3) the coach who did not act as a supervisor and was not a part of the CCC. Interestingly, while some residents felt conflicted with having a coach who also evaluated them, some also felt this combined relationship allowed their coach to have a deeper understanding of them as an individual and offered the opportunity for more personalized coaching. Conversely, residents with a nonsupervisor coach felt the interactions were superficial without a more contextualized relationship outside of the coaching meetings.

Lastly, the importance of the coach–assessor role separation may depend on the intended coaching application for the program. Procedural and technical-skill coaching is extremely effective when using a coach who is in charge of observing, providing feedback to, and coaching the resident.[54] On the other hand, well-being coaching may benefit from a complete separation of roles to allow for the resident to feel comfortable discussing sensitive topics. If a program desires a separation of roles, they may consider training nonclinical faculty employed by the department as coaches to preserve this relationship. However, more recent recommendations note that coaches who interact with physicians need to be very familiar with the unique challenges of medical training, including the nuances of professional norms and cultural context within medicine, given the intertwined personal and professional concerns coachees may have.[23,28]

> We recommend that, regardless of the coaching application selected, the coaches be very intentional and transparent about the role they are assuming prior to beginning the relationship with a resident. It may also be beneficial for the coach to frequently remind the resident about the nature and scope of their role during meetings.

Faculty development as coaches

Specific training is essential to prepare faculty for the unique aspects of residency coaching. Without targeted training on the coaching approach, many faculty may feel inadequately prepared to navigate even common discussion points that may arise in coaching sessions.[47,55,56] Many resources highlight the need for coaches to build several different types of skills in preparation for acting as a coach.[26,28] These skills are described further in Figure 1. A residency program director/coaching champion may consider doing a local needs assessment of what specific coaching skills will be necessary based on the intent of the coaching program (technical skills coaching will have different needs than well-being coaching) and what the current skill set is among potential coaches.

There is currently a lack of practical training curricula for internal coaches. Therefore, there is a great degree of variability in coaching curricula in terms of training facilitator experience (ICF-certified coach[19,55] vs. faculty colleague[44,57]), educational strategies (lecture vs. small-group practice or both), duration of training (single

FIGURE 1 Targeted goals and objectives for faculty coach education and development.[26] *Material that may be delivered via asynchronous content.

session,[12,22,58] multiple brief sessions[10,13,17,30,47]), and content of training.

Based on our collective experiences, we recommend a longitudinal faculty development curriculum (including introductory course(s) and refresher sessions) that includes ample opportunity for practice of skills in a safe, supportive space. This curriculum must be cognizant of other faculty time demands and thus may incorporate high-yield synchronous sessions with as much asynchronous content as possible to allow for schedule flexibility. It is beneficial to nurture a shared community of coaches to allow for reflection and learning from each other's experiences.

Residency programs must consider recruiting a diverse cohort of faculty to serve to best service their residents. Despite any attempts at matching for interests and personality, the coaching

relationship will likely bring together two individuals from different lived experiences, ethnicities, races, backgrounds, or beliefs. Thus, there is a paramount need for coach training around ethical coaching practices and understanding the challenges that individual residents face within medical education, especially those from backgrounds not typically represented in medicine.[23,28,59] After implementing a multisite coaching program across five institutions, Palamara et al.[60] noted a decrease in wellness among female trainees and an increased rate of burnout in Black/Asian/Hispanic trainees. This demonstrates a need to further explore best practices for supporting trainees who are underrepresented in medicine. Coaches will undoubtedly need to be critically self-aware and open to acknowledging and mitigating their own biases when interacting with residents in order to keep an open mind and employ thoughtful inquiry.

Once a plan for faculty development is solidified, it is imperative to provide a role description and estimated time commitment prior to soliciting applicants to ensure interested faculty are cognizant of the expectations and anticipated responsibilities of a coach.[36,56] In addition, if faculty with previously defined educational roles are selected (e.g., assistant/associate program director), it will be critical to clearly delineate administrative roles (such as conducting semiannual reviews or participating on remediation committees) from coaching responsibilities. Lastly, programs will need to consider if coaches will be supported with protected time and/or additional CME allowances to attend training and perform coaching.[56,61] Appendix B. provides further detail on coaching program characteristics, including investment3 in coaches and program cost, at each author's respective institution.

Matching residents to coaches

Individual residency program characteristics (such as the number of residents) may impact the structure of a coaching program, particularly the matching of coaches to trainees. Residency programs must consider the delicate balance between training enough faculty to become quality coaches, so as to not overburden a single coach, while avoiding training too many coaches early on that overburden the administrative ability to ensure a quality experience to all residents in a new coaching program.

> There is unlikely to be a one-size-fits-all recommendation for every program in this area; however, in general we recommend starting with a smaller faculty cohort who are dedicated to the program's success and then leveraging early wins and the learned expertise of a smaller group to expand the program.

A coaching program must consider how to optimally pair residents to coaches. Resident perception of the individual faculty coaches may be the most important factor for coach selection. Faculty who are perceived as role models with valuable perspectives will likely have the most success in building the coaching relationship.[18,36] Many residents prefer coaches that are within their specialty and have similar interests and life experiences to establish the foundation of their relationship.[15,17,47] Programs with larger coach cohorts with more diverse interests and personalities may have the freedom to consider a more nuanced determination of how coaches are assigned to residents. For example, a random assignment of coaches may be the fairest approach for all participants but may result in relatively weaker coaching relationships. Allowing residents to select their own coaches or assigning residents to coaches based on similar interests may allow for stronger relationships; however, it may unfairly overburden favored coaches.[37] As cited above, residents may prefer coaches who are more similar to them as they may be perceived as more likely to understand their perspective; however, having a coach with a dissimilar set of experiences, personality, or interests may also hold the benefit of providing a differing external perspective.[62]

> We recommend a blended approach where coaching assignments are made thoughtfully by the coaching champion with attention toward resident needs, faculty workloads, and likely compatible styles, with an allowance for residents who wish to apply for a coach change at the end of each year.

Lastly, programs must consider if individual (1:1) or group coaching sessions will better suit the residents' needs. While both approaches have demonstrated effectiveness in changing behaviors and developing skills, there may be an increase in satisfaction and goal attainment with an individualized approach.[63] An individual coaching session also allows for more privacy and confidentiality when discussing sensitive topics. Alternatively, group coaching may be more logistically feasible for the coach and program and has the potential to create near-peer coaching and community among residents for an additional layer of support.[64]

Logistical considerations of conducting coaching sessions

Characteristics of coaching sessions should be considered carefully and established well before specific meetings are scheduled to ensure expectations are clear for both coaches and residents (see Table 2 for specific logistical factors to consider). While flexibility is crucial to fit each resident's needs, coaching sessions should be regular, organized, and at least partly driven by the resident.[36,37,64,65] Once logistical norms are established for a coaching program, leaders may consider utilizing a coaching agreement, a common practice in coaching relationships, that includes specifics as listed in Table 2. The coach and resident can review the agreement and sign it at the onset of the coaching relationship as a sign of mutual commitment to the process.[36]

There is no current literature demonstrating the most effective number or frequency of coaching sessions for medical learners. Established GME-based coaching programs, focusing primarily on

TABLE 2 Logistical considerations for approaching coaching sessions in GME.

Potential approaches for coaching sessions	GME-specific considerations	
	Potential benefits	**Potential drawbacks**
Selected coaching application/intent of program Mandatory or optional Leadership development Performance Professional development Well-being Coaching around remediation or transitions	Mandatory coaching program • Ensures equity in educational opportunities • Certain coach approaches (performance, professional development, well-being) may benefit all residents	• May take away from some of the voluntary benefits of a coaching program (e.g., if trainee sought out and driven it could promote a more equal relationship and more investment from trainee; if mandated to make an ILP, could feel more forced and less trainee-focused) • May be more beneficial to focus efforts of a limited coach cohort on trainees who need it most (performance coaching for lower-performing trainees)
Session frequency Frequent Few	Frequent meetings • Trainee feels more supported with increased coach facetime Few meetings • Feels less like a burdensome relationship on both ends • Can truly discuss impactful aspects of resident growth or areas that still need improvement given the likelihood of more available data points to inform progress	• May cause undue stress on trainees if they feel like they are not adequately completing goals or tasks prior to the next meeting • May dilute impact of coaching sessions if there is not material to discuss or address • Not enough touch points with trainee to truly have an impact with coaching strategies • Both coach and trainee may forget how to interact with the coach approach
Meeting format In-person Virtual	In-person meetings • Invests the meeting with a sense of importance • May create a more comfortable space to discuss sensitive topics	• More difficult to coordinate given busy resident schedules
Trainee responsibilities Resident-driven relationship Coach-driven relationship	Resident-driven relationship • Generates buy-in from trainee and allows them to feel empowered in the relationship • Encourages development of the master adaptive learner	• May not be familiar with coaching process—may require a period of immersion to understand the process and find it useful
Agenda use Set agenda De novo conversations	Meetings with a set agenda • May contribute to more effective meetings • Can assist with maintaining space for coaching separate from social discussions	• Trainee may not feel comfortable bringing up new or spur-of-the-moment concerns or topics
Coaching "contract" Signed contract Written guidelines/expectations Verbal discussion and agreement	Creating a signed contract • Outlines clear expectations that are understood by both parties • Either party can refer to or modify a physical document at any time during the coaching relationship	• May feel like an official process that takes away from some of the trust and confidentiality necessary in a coaching relationship • Will require significant alterations (outlining extenuating circumstances that may need to breach confidentiality for trainee/patient safety) from standard coaching contract
Documentation ILP Other performance plans	Documenting an ILP • Allows trainees to identify areas for growth, set goals, create plans to improve, and track progress over time	• Trainee may feel hesitant in writing down sensitive goals or plans for fear of the risk of breaching confidentiality • Need to be aware of state laws and institutional policies on educational documentation

Abbreviation: GME, graduate medical education; ILP, individualized learning plan.

performance coaching or well-being coaching, have implemented meeting frequencies ranging from quarterly[10,12,15,21,47] to every 2 months[17,57,58] to more frequently.[9,11]

> We recommend at least quarterly coaching sessions to foster the initial development of the coaching relationship and build rapport while also establishing a consistent meeting schedule to allow both the coach and the resident to get comfortable with the process and cadence of coaching. It is also necessary to clearly delineate and tailor expectations of the coaching relationship between each coach–resident pair, preferably in written form, so that it can be referred back to by either party if needed.

Integrating feedback into the coaching approach

While faculty should not provide direct feedback to a resident when utilizing a coaching approach (outside of technical performance coaching), the integration of externally sourced feedback into the coaching session in medical education can be tremendously powerful as a springboard for discussion of growth areas.

The data used to inform each coaching session will vary depending on the type of coaching chosen. The majority of coaching approaches will benefit from using data from programmatic assessment: multiple assessments across time, in multiple contexts, and from multiple rater perspectives.[66] A CBME model using entrustable professional activities is one ideal model for this.[6] Additional assessment data may include multisource feedback from other team members such as nurses, pharmacists, social workers, etc. It may also come in the form of more formal assessments using tools such as direct observation of procedure skills,[67] mini–clinical evaluation exercises,[68] quality improvement initiatives, or simulation. Lastly, the CCC, who uses programmatic assessment data and best practices in group process to determine resident progress, can provide additional synthesized learning assessment and provide feedback to the resident on overall performance and next steps to consider for continued growth.[69]

Coaching sessions should pair these necessary objective data with the resident's own assessment of their performance and overall well-being. This process allows residents to improve their ability to perform self-assessments and to work through any dissonance between internal and external assessment with their coach.

> We recommend that residents' self-assessment be guided by a structured form (i.e., ILP for performance coaching) that includes reviewing their performance data, identifying areas for growth, setting overarching goals in each of these areas, and crafting a plan to meet each goal.[67] Over time, the structured form can help residents iteratively review progress with

TABLE 3 Summary of author recommendations for coaching program design and implementation.

Program considerations	Recommendations
Critical differences between traditional coaching and coaching in medical education	Recognize that coaching in medical education has critical differences than traditional coaching relationships: • Not the same rigor of coach training and practice • Assigned relationships (usually) rather than completely voluntary • Extenuating exceptions to maintaining confidentiality • "Coach" vs. "coaching approach"
Coach selection	When considering the use of internal physicians as coaches: • Select faculty who are viewed as allies by the residents • Clearly delineate role separation between other academic faculty roles and coaching role • Consider separation of coaching role from progression decisions
Coach development	When training internal physicians as coaches, consider: • Longitudinal curriculum (introduction with refresher courses throughout the year) • High-yield asynchronous material to respect other faculty physician responsibilities • High-yield in-person sessions to practice coaching conversational skills and build shared community to learn from each other's experiences • Provide a role description and estimated time commitment prior to recruitment • Consider protected time or CME allowances for coach training and participation
Matching trainees to coaches	Unlikely to be a one-size-fits-all, but consider: • Matching coaches to all residents in order to maintain equity in opportunities (opt-out choice for optional programs) • Opportunities for residents to request alternative coaches
Coaching "contract" agreements	Consider: • A written coaching contract that is mostly standardized but logistically tailored to each individual coach-trainee pair: • Consider quarterly, in-person coaching meetings to establish rapport, cadence, and flow of coaching relationship and conversations • Emphasize resident-driven agendas as much as possible to allow for resident autonomy and engagement

Abbreviation: CME, continuing medical education.

their coaches, prepare for future sessions, provide accountability, and develop adaptive expertise. This structured form should ideally be kept confidential between the coach and resident to facilitate transparent sharing of information and psychological safety within the coaching relationship.

Many programs will use a hybrid of several of the coaching models noted in Table 1 to address academic and clinical performance, leadership and professional development, and well-being. Programs seeking to implement a robust coaching program should endeavor to pair their efforts in this area with concurrent efforts at developing a robust assessment program to ensure quality data to feed into coaching conversations.

Program evaluation

Although resources exist to inform coaching program evaluation,[13,35,70–72] evaluation plans will vary among residency programs depending on the program aims and desired learner or program outcomes. As learner needs may change over time (and even over the course of their residency training), the coaching program may need to adapt to address these needs.

We recommend regular program evaluation to ensure the coaching program is addressing learner needs.

IMPLICATIONS FOR EDUCATION AND TRAINING IN EM

We recommend EM program leaders aiming to develop and implement coaching programs recognize the differences between traditional coaching and the coaching approach with residents; identify a coaching champion to perform a local needs assessment to determine which gaps the coaching program will fill and outline program goals; carefully consider selection of coaches and possible conflicts of interest, especially when using internal faculty physicians; use a longitudinal curriculum for coach development; educate both residents and faculty on the basics of the coaching approach and outline clear expectations for both parties on program goals, relationship building, and meeting logistics; and foresee the need for internal program evaluation and iterative improvements (see Table 3 for a summary of author recommendations).

Future needs include rigorous program evaluation to determine the most effective resources and methods for coach development, the optimal program logistics for scheduling and conducting coaching meetings, and the most beneficial coaching approach and content for resident learners in emergency medicine.

AUTHOR CONTRIBUTIONS

Study concept and design (all); acquisition of data (N/A); analysis and interpretation of the data (N/A); drafting of the manuscript (all); critical revision of the manuscript for important intellectual content (all); statistical expertise (N/A); obtained funding (N/A); administrative, technical, or material support (N/A); study supervision (N/A).

CONFLICT OF INTEREST STATEMENT

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SUPPORTING INFORMATION

Additional supporting information can be found online in the Supporting Information section at the end of this article.

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