

Foreword

The profound and rapidly changing character of war and conflict in the 21st century compels us to transform our leader development to maintain our competitive advantage and successfully prepare for the emerging ways of war our Nation could face.

Our collective aim is the development of strategically minded joint warfighters, who think critically and can creatively apply military power to inform national strategy, conduct globally integrated operations, and fight under conditions of disruptive change.

This document provides the shared vision of the Joint Chiefs of Staff for the outcomes we should strive for and lays out guidance to obtain them. This vision is intended to guide the development of leader development strategies and talent management approaches that will in turn produce the leaders required by the Nation.

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## Developing Today's Joint Officers for Tomorrow's Ways of War

### The Joint Chiefs of Staff Vision and Guidance for Professional Military Education & Talent Management

There is more to sustaining a competitive advantage than acquiring hardware; we must gain and sustain an intellectual overmatch as well. The agility and lethality of the force must be applied appropriately to deter, fight, and win against adversaries who have studied our methods and prepared themselves to offset our longstanding military superiority. This cannot be achieved without substantially enhancing the cognitive capacities of joint warfighters to conceive, design, and implement strategies and campaigns to integrate our capabilities globally, defeat competitors in contests we have not yet imagined, and respond to activity short of armed conflict in domains already being contested.

*The evolving and dynamic security environment, which includes disruptive changes in the character and conduct of warfare, demands immediate changes to the identification, education, preparation, and development of our joint warfighters.*

The 21st century demands American officers be far better educated and more capable of directing and integrating the Nation's military instrument. The intellectual capabilities described above are developed over a career and not as a result of episodic educational opportunities, especially when those opportunities are neither current nor rigorous. Rather, these capabilities are honed over thousands of hours of deliberate practice, pushing cognitive limits and intellectual performance. An officer's career must be designed to continually develop, refine, and exercise new intellectual skills, especially up to and including the most senior ranks.

Achieving our leader development aim requires a new trajectory for our professional military education (PME) that must include associated talent management systems. Our vision is for a fully aligned PME and talent management system that identifies, develops, and utilizes strategically minded, critically thinking, and creative joint warfighters skilled in the art of war and the practical and ethical application of lethal military power.

## **THE SECURITY ENVIRONMENT AND GLOBAL INTEGRATED OPERATIONS**

Up to now, our PME programs have turned out officers who have served the Joint Force and our country admirably. The National Defense Strategy and the National Military Strategy clearly make the case that our security environment is changing. The return of great power competition raises the stakes for readiness and for innovation. While change is inherent to our understanding of war's character, the accelerating pace and convergence of new technologies

portends dramatic changes in how conflicts are waged, and thus requires profound change in how we plan for and execute operations. To succeed in deterring or winning the conflicts of the future, we must similarly adapt our leader development enterprise and not shy away from fundamental change where appropriate. For the Joint Force, changes in the character and conduct of war and operations demand:

- Continuous integration of national instruments of power and influence in support of national objectives;
- Critical strategic thinking across the Joint Staff and other joint headquarters;
- Unprecedented degree of global integration of the all-domain resources available from our Combatant Commands to generate advantage for ourselves and dilemmas for our competitors;
- Creative approaches to joint warfighting and sustaining momentum in our campaigns;
- Highly effective coalition, allied, international partner and U.S. coordination and integration; and
- Deeper understanding of the implications of disruptive and future technologies for adversaries and ourselves.

These emerging intellectual requirements have not been the focus of our current leader development enterprise. We can do better at linking the selection of our students, the school they attend and what they learn there, and their subsequent assignments. We must consistently prioritize critical and creative thinking, continuous learning and professional development, and the pursuit of transregional and cross-domain excellence in the development and assignment of joint warfighters. We will collectively identify follow-on assignments that continue to exercise and build the new intellectual capital created through PME.

Our country requires warfighting leaders and staff officers capable of waging war and leading in a dynamic, globally integrated environment. We cannot simply rely upon mass or the best technology. In the future, that technology may be in the hands of our opponents. Our job is to learn how to apply our capabilities better and more creatively.

These requirements increase the demands on our leadership development continuum that we are not yet meeting. Put plainly, **we require leaders at all levels who can achieve intellectual overmatch against adversaries.** To achieve this, we must continue to adapt and innovate throughout our PME programs and talent management efforts to shift our policies, behaviors, and

cultures to keep pace with the changing character of war. The cognitive capabilities these leaders bring to globally integrated operations are not solely the output of a 10-month course; they are the product of a deliberate career-long professional development ethos and learning continuum.

## **DESIRED LEARNING CONTINUUM END STATES**

The development of leaders requires an enterprise-wide and holistic approach. Joint leader development for the 21st century is the product of a learning continuum composed of training, staff and operational experience, education, exercises, and self-development/improvement. To achieve intellectual overmatch against adversaries, we must produce the most professionally competent, strategic-minded, and critically thinking officers possible. Our established Desired Leader Attributes guide us toward this. Following is the vision for enhanced learning continuum end states for PME and Talent Management.

**Requisite Joint PME End States.** PME and JPME programs must provide graduates the initial knowledge and skills to prepare them for service as warfighting joint leaders, senior staff officers, and strategists who:

- Discern the military dimensions of a challenge affecting national interest, frame the issue at the policy level, and recommend viable military options within the overarching frameworks of globally integrated operations;
- Anticipate and lead rapid adaptation and innovation during a dynamic period of acceleration in the rate of change in warfare under the conditions of great power competition and disruptive technology;
- Conduct joint warfighting, at the operational to strategic levels, as all-domain, globally integrated warfare, including the ability to integrate allied and partner contributions; and
- Are strategically minded warfighters or applied strategists who can execute and adapt strategy through campaigns and operations. All graduates should possess critical and creative thinking skills, emotional intelligence, and effective written, verbal, and visual communications skills to support the development and implementation of strategies and complex operations.

**Requisite Joint Talent Management End States.** Service talent management systems must provide officers opportunities to refine their existing knowledge and develop increasingly agile intellectual skills. Toward this end, these systems should:

- Reward continuous intellectual development and growth;
- Make individual officers accountable for academic performance and record that performance in their permanent records;
- Target officers who have performed well for follow-on assignments that hone newly acquired skills or broadening opportunities to apply their skills in different ways; and
- Match officers' cognitive attributes with appropriate PME opportunities and positions of responsibility.

## **CRITICAL TASKS**

The following outlines fundamental changes we need for modern leader development.

**Adapt and Innovate PME.** Our PME enterprise must continuously assess, adapt, and innovate. We cannot afford to be complacent, nor can we afford to shortchange PME institutions and their students with barriers to effective learning or inadequate resources. Our first task is to reorient the PME enterprise to prepare joint officers to operate globally, across all domains, and lead decisively throughout the remainder of their careers. Initially we must shift our PME curricula from a predominately topic-based model to an outcomes-based approach and emphasize ingenuity, intellectual application, and military professionalism in the art and science of warfighting, while deepening knowledge of history. Staying current means that our work is not done once these initial tasks are complete. Warfare, geopolitics, technology, and instructional methods will continue to change, and our PME systems must keep pace.

**Infuse Joint Context throughout Officer Careers.** We must reassess our current JPME framework in the context of demonstrated experience over the past 30 years to ensure we are evolving JPME requirements of the 21st century. Because the need for jointness is broader and deeper in an officer's career than our traditional Service-based career models envisioned, we must infuse jointness earlier and deeper throughout an officer's career. Service PME and leader development, not just intermediate and senior-level programs, require infusion of the joint context. At intermediate and higher levels, this entails the ability to synthesize capabilities across the Joint Force and in all domains. This wider synthesis must include the broader joint context that includes the interagency, intergovernmental, and multinational arena. In addition, our intermediate PME programs also must ensure they deliberately provide the practical preparation for their graduates to serve more effectively as staff officers

in our joint headquarters. We cannot afford to treat jointness as an afterthought that can be bolted on later, in the midst of a crisis.

**Develop Practical Warfighting Skills.** The driving mindset behind our reforms must be that we are preparing for war. In future wars we envision all-domain operations to generate effective joint command and control, globally integrate effects, and conduct cross-domain fires and maneuver. Maneuver, via simultaneous combinations of both physical and cognitive capabilities, across an expanded battlespace seeks to directly create critical vulnerabilities in an adversary's systems and generate multiple dilemmas. The Joint Force's ability to create and exploit these all-domain dilemmas is a critical operational advantage in future contingencies across the conflict spectrum. Globally integrated and all-domain operations present challenges for tomorrow's warfighters that our educational system must adapt to today.

Being cognitively prepared to conduct these operations necessitates an adjustment in how we educate tomorrow's warfighter. Our educational system must sustain our ability to apply the art and science of war to the generation of both creative applications of military force and asymmetric warfighting. PME schools must incorporate active and experiential learning to develop the practical and critical thinking skills our warfighters require. These methodologies include use of case studies grounded in history to help students develop judgment, analysis, and problem-solving skills, which can then be applied to contemporary challenges, including war, deterrence, and measures short of armed conflict. Curricula should leverage live, virtual, constructive, and gaming methodologies with wargames and exercises involving multiple sets and repetitions to develop deeper insight and ingenuity. We must resource and develop a library of case studies, colloquia, games, and exercises for use across the PME enterprise and incentivize collaboration and synergy between schools. To achieve deeper education on critical thinking, strategy, and warfighting, PME programs will have to ruthlessly reduce coverage of less important topics.

**Adapt and Innovate Talent Management.** Our collective talent management enterprise, based on individual Service personnel processes, must likewise continuously assess, adapt, and innovate. The positive benefits of adaptation and innovation in our PME enterprise are suboptimized if we do not wisely identify and nurture the development of the human talent in the Joint Force. Our best and brightest must be identified, assigned to schooling, and employed in such a way that maximizes both their potential and the benefit for the Joint Force. Careful selection of who goes to school and when, who teaches them, assessments of cognitive abilities, and purposeful post-PME assignments require adaptation and innovation to realize this vision.

**Identify the Right Students.** Services must align the best talent to the right PME venue and then sequence that talent toward the most critical strategic assignments. Critically, senior-level PME attendance must be based on talent, potential for strategic responsibilities, and return on investment, rather than a fair share or mechanistic allocation of all occupational specialties across a particular Service. It is essential that officers with the highest potential to be the warfighting generals and admirals of the future attend a resident 10-month War College program, so that they receive a strategic education. PME schools also must ensure prospective students have the attributes and professional competencies to contribute to peer learning and succeed in the course by applying tools such as entrance examinations, applications, or screening criteria.

**Demand and Reward Academic Excellence.** In-residence PME is an invaluable period of intense reflection and application to prepare for assignments of greater responsibility. We must reinforce a culture across our Armed Forces that enables professionals to apply themselves and grow to their potential in challenging PME programs and top-tier graduate studies to build upon and enhance their operational experience. We shall foster an environment where students are inspired to master the fundamentals of the art and science of war in an atmosphere and culture that encourages intellectual curiosity, stimulates critical thinking, rewards creativity and risk-taking, and understands the value of multiculturalism and allied perspectives. To move to a higher trajectory, we must remove constraints on student learning by supporting various learning styles, behaviors, and individual desires. Schools should capture student performance and potential in academic evaluation reports that include research, writing, and analytic achievements and demonstrated leader attributes. We should ensure PME performance is linked to the selection and assignment processes.

**Foster Professional Faculty.** A highly professional faculty is the core of success. A world-class educational program is not an accident, nor does it come cheap; it is the product of deliberate design, founded upon a top-notch faculty. Every PME institution must make sure its military and civilian faculty are qualified instructors and current in the fields they are teaching. The selection, development, and management of PME faculty, and military faculty in particular, demands greater emphasis.

- We must incentivize the right officers to pursue a faculty assignment and the Services to facilitate such assignments. As such, Services should implement the full array of talent management programs to incentivize faculty assignments. A faculty assignment should be competitive, career enhancing, highlighted during promotion boards, and tracked to ensure follow-on assignments capitalize on skills gained. A cultural change of this

magnitude requires leaders, at all levels, to corporately value faculty assignments, eliminate roadblocks impeding progress, and remove any stigma devaluing the importance of educating our future senior leaders. In this vein, we should consider lifting the blanket exclusion of some Service officers receiving joint credit for faculty assignments at CJCS-accredited Service JPME programs, allowing our programs to nominate certain positions as joint.

- We must reward teaching excellence; attract, develop, and retain high-quality professional faculty in our learning institutions; and leverage professional civilian faculty with the credentials to teach at the requisite levels. Because PME curricula must be as dynamic as the environment, our faculties must be fully resourced for experiential learning, research and course design, and for continuous curriculum assessment, improvement, and integration.
- Success also requires that we fully invest in our academic support architecture. In addition to our facilities, we have to resource, sustain, and protect vital academic support functions, to include education and information technology, and the organizational activities needed to empower faculty and enable students to achieve the learning outcomes.

**Regard PME as a Strategic Asset.** We must innovatively leverage PME programs and curricula as a strategic asset to build trust and cognitive interoperability across the Joint Force and to integrate allies and key U.S. and international partners. To further this element:

- Our PME institutions must be an agile and adaptable enterprise. Collaboration across our PME network enhances our programs, builds synergy and deeper understanding, and enables us to focus on key problems. In the process, the education enterprise can serve our joint warfighters with rigorous studies and research, concept development, and exercise design. Our PME enterprise must be dynamic. To remain relevant, we must periodically assess our programs, validate missions and focus, as well as determine gaps and where new programs are needed. At the same time, we should strive to make our PME enterprise accessible to the force that is not in residence and support self-development and unit professional development programs, recognizing that these extend the core mission.
- We must continue to incorporate allied and partner students within our PME system to better prepare our own officers for global operations. Strong relationships between PME institutions are also important to support allied and partner PME programs as we innovate, creating



opportunities for closer ties and deeper collaboration, and for greater U.S. student participation.

- We must include both the Total Force and select Defense Department civil servants into senior-level development programs and PME to ensure they remain integral members of our staffs and operations. In addition, we must strengthen our interagency and intergovernmental perspectives.

**Align Education and Utilization of Talent.** The deliberate, purposeful use of PME graduates is an essential task directly linked to better campaign outcomes. We require effective processes for the assignment and utilization of PME graduates to ensure follow-on assignments capitalize on academic achievements and learning. We must deliberately leverage the academic experience, research, and experiential learning of PME graduates to a much greater extent. We must ensure academic evaluations capture officer accomplishments and expertise to aid the talent management processes. To achieve the vision outlined herein, we must reward officers who exhibit intellectual excellence with appropriate assignments and the potential to remain competitive in their careers. Additionally, we need to ensure we are producing a sufficient number of joint qualified officers in our JPME system for the Joint Staff and joint headquarters.

**Leverage Joint Exercises.** The use of exercises is a key part of the continuum of learning as well. We must be prepared to place exercise participants into situations of uncertainty and complexity where creativity, adaptability, critical thinking, and initiative are stressed and demonstrated. The planning and application of cross-domain capabilities should be a key part of these exercises as well to reinforce the developing cognitive capacity to recognize problems and opportunities and initiate rapid decision-making as an essential aspect of joint integrated operations. Our joint exercises should be leveraged as a feedback loop that links issues and lessons back into our leadership development and PME system. Conversely, our scholars and practitioners in PME can contribute their educational research to support our combatant commanders as well.

**Identify and Develop Strategists.** We need a select cadre of officers who can meaningfully contribute to the formulation of strategies. The joint community requires processes to identify and develop strategists, not just operational and campaign planners. PME schools and general and flag officers all must play an active role in identifying strategic talent and innovators. Advanced civil schooling, fellowships, and broadening opportunities offer valuable augmentation to the JPME enterprise, but they must have clear outcomes and do not qualify as JPME attendance. A select number of the students in our PME programs will demonstrate the potential to be more than applied strategists; they will also have the skills to creatively design holistic and integrated political-military and cross-domain strategies or develop new doctrinal concepts.

Consequently, we must create and preserve opportunities in our curricula for specialization. We must identify these potential strategists and tailor programs for them to develop their thinking and contributions.

## **OUR IMPERATIVE**

We face a future that demands a change in emphasis and urgency. We must identify and select officers who display an intellectual edge and can outthink our adversaries in war amidst uncertainty and disruptive change. Creating the intellectual overmatch and mental agility that we require cannot be achieved by intermittent education or by past experience alone. It is created by the purposeful combination of education, training, rigorous exercises, and application in the real world. To meet this imperative, we have set the trajectory for a continuous transformation that must begin immediately. We require a concerted effort across the Joint Force to establish the foundation to implement this vision. The result will be a cultural and intellectual shift in the Joint Force and the Services.

An investment in the cognitive aspects of our profession is not enough. We must ensure we develop mechanisms that integrate PME programs and talent management, constantly assessing and adjusting, iteratively moving leader development along our steeper trajectory to address creatively our most critical warfighting needs. We have a collective responsibility that demands we act with all due speed. Our Nation deserves and requires nothing less.