

SPECIAL COMMUNICATION

Building Research Capacity (BRC): Purposes, Components, and Activities to Date

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The Building Research Capacity (BRC) initiative was founded in 2015 as a collaboration between the Association of Departments of Family Medicine (ADFM) and the North American Primary Care Research Group (NAPCRG). It aims to enhance family medicine research engagement by helping develop researchers, research educators, and research leaders. Through consultations, a fellowship, tailored presentations at national conferences, and ongoing assessment, BRC addresses the dynamic needs of various stakeholders in family medicine research. There is a growing need for organized efforts in primary care research capacity development, and BRC is positioned to provide ongoing leadership and direction. Targeted areas of growth for BRC are expansion and diversification, collaboration, and iterative evaluation and adaptation. A commitment to innovation, inclusivity, and adaptability propels BRC toward transformative growth in family medicine research. (J Am Board Fam Med 2024;00:000–000.)

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Introduction

The evolving landscape of family medicine research involves participation from departments, residency programs, professional organizations, and individuals. To help provide unity in these efforts, the Association of Departments of Family Medicine (ADFM) Research Development Committee collaborated with the North American Primary Care Research Group (NAPCRG) Executive Committee to develop the Building Research Capacity (BRC) initiative. Since its inception in 2015, the goal of

BRC has been to “provide opportunities for all departments and residency programs (and the individuals within them) to engage family medicine leaders, researchers and each other. Mutually beneficial interactions under the BRC umbrella build research capacity along with the actual accomplishment of published and presented research and scholarship.”¹

Building research capacity in family medicine involves increasing the number of researchers, scholarly activities, research projects, published research, and research funding for departments of family medicine. BRC assists in these goals through formal consultations for departments and residency programs, a year-long fellowship for research leaders seeking to develop strategies for growth and development, and educational presentations and workshops on topics related to building research capacity. These workshops are delivered at family medicine conferences such as the annual meetings of ADFM, NAPCRG, Society of Teachers of Family Medicine (STFM), Association of Family Medicine Residency Directors (AFMRD), and other conferences. BRC also has an assessment and evaluation team that has gathered feedback on presentations, consultations, and the fellowship.

Since the inception of BRC, the ADFM and NAPCRG Boards have provided staff support and coordination. STFM and AFMRD have also

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Table 1. Process for a Building Research Capacity (BRC) Consultation

Initial engagement
<ul style="list-style-type: none">Interested department contacts BRC for information on a consultationExperienced BRC consultant performs the initial exploratory consult at no charge in order to understand the context, goals, and needs of the clientWritten exploratory report is given to the client for review and editClient decides if consultation is still desired and in what form (e.g., virtual vs in-person; multi-day extensive review with follow up vs regular virtual meetings)
Full consultation
<ul style="list-style-type: none">Identify consultant(s) – not necessarily the same person who performed the initial exploratory engagement; may provide more than one consultant option and allow client to chooseDevelop contract with specific goals of consultation, form it will take, timeline, cost, and deliverablesConsultation happens and chosen consultant provides regular update reports to the consultation workgroup and staffDevelop initial report and get feedback from clientDevelop final report with specific action options for client to consider implementingSchedule follow up virtual contact to provide any further assistance to client in implementing an action plan
Evaluation of consultation
<ul style="list-style-type: none">Consultant shares final report with evaluation groupEvaluation group sends evaluation survey sent to client within 2 to 3 weeks of completion of consultationInterviews with client about outcomes as neededBased on the client feedback, an evaluation report is prepared and shared with the consultant as well as the consultation workgroup and staff

supported BRC by providing liaisons to the BRC Steering Committee and facilitating BRC presentations at annual conferences. BRC is sustained largely by volunteer leaders, researchers and educators from the family medicine community. Fees are charged for formal consultations as well as the BRC Fellowship to fund staffing expenses and activities that cannot be provided through volunteer effort. Oversight is provided by the ADFM and NAPCRG Boards of Directors.

Consultations

The Consultations arm of the BRC initiative focuses on aiding Family Medicine Departments, medical schools, residency programs, or similar organizations to foster a culture of inquiry and advance knowledge that informs education and practice and supports the health of family medicine patients. It emphasizes responsiveness to client needs, aiming for a client-centered approach rather than solely being instructional or expert-centered. The process involves understanding the client's perspective thoroughly before offering recommendations, ensuring a tailored and meaningful outcome. Consultation phases span from exploration to contracting and report delivery, aiming to offer practical advice aligned with the client's goals.

The consultation process begins with an exploratory phase to understand organizational context and goals. This involves evaluation and feedback loops between the expert BRC consultants and the client, focusing on continuous improvement. The consultation efforts are

supported by staff from ADFM, ensuring smooth coordination between consultants and clients.

A total of 26 departments of family medicine have had initial exploratory calls with consultants who help them determine whether a full consultation would be helpful. Of these department, 11 have opted for the complete consultation. Consulting departments come from all regions of the United States and from Canada in departments ranging in size from dozens to hundreds of clinicians and researchers. Consultation options range from brief to intensive sessions (Table 1). Regardless of the length of the consultation process, the consultation culminates in a final report that provides clear, practical advice to help the client achieve organizational goals for research and scholarship. After delivery of the final report, a follow up discussion is arranged to discuss the report and clarify any conclusions. Consultation outcomes have included dramatic increases in research funding, preparation for new strategic plans, and support for incoming research directors as they navigate new roles, stakeholders and responsibilities. Clients are also asked to provide feedback through an evaluation of the process and outcome once their consultation is completed.

BRC Fellowship

Many individuals are put into leadership positions in research based on their prior success as researchers.² In many cases, these leaders do not have formal training in a leadership role. In 2018, BRC developed a fellowship to help train research leaders in family

Table 2. Demographic Characteristics of Building Research Capacity (BRC) Fellows

Characteristic	Number of fellows (n = 26)
Gender identity	
Woman	15 (58%)
Man	11 (42%)
Location	
United States	24 (92%)
Canada	2 (8%)
Educational background	
MD/DO/MBBS	10 (38%)
PhD	14 (54%)
Dual degree	2 (8%)
Institution type	
University	22 (85%)
Community-affiliated	4 (15%)

medicine, providing them with “the knowledge, leadership skills, mentorship, and peer support to develop and implement a strategic plan for building research capacity within their own programs, departments, or institutions.”³

Since its inception, the fellowship has had 20 graduates, and has a current cohort of 8 fellows. Fellows come from a variety of backgrounds, including clinicians (MD/DO/MBBS), researchers (PhD), and academicians. They come from several regions in the United States and Canada, and represent various research settings, from academic institutions to community-based residencies (Table 2). The commonality among them is a drive to help research in their department succeed and grow. The capstone project of the fellowship is a strategic plan for research in their department. Fellows present these plans as Strategic Plans Advancing Research Capacity (SPARC) Presentations at the NAPCRG Annual Conference at the end of their fellowship year. Attendees can view the plans presented by the fellows and learn about strategies for building research capacity.

The fellowship contributes to the overall goal of BRC to help departments and residency programs increase research output in a mutually beneficial way by developing effective research leadership.¹ As research leaders become more effective, research departments become more effective.⁴

Presentations/Curriculum

Addressing the need for continued dialog and training in research capacity development, BRC presents educational workshops at our national conferences:

ADFM, NAPCRG, STFM, and AFMRD. Attendees learn frameworks and practical tools to apply in their unique situations. Often, these presentations serve as a nexus of connection for academics, practitioners, and leaders, leading to collaborative efforts. Since 2016, there have been more than 30 presentations on a variety of topics (Table 3). BRC coordinates the efforts of content experts who can share their knowledge with the broader family medicine academic community.

A particular advantage of the multi-organizational and multi-disciplinary nature of BRC is the ability to tailor curriculum presentations to various audiences. For example, presentations at ADFM focus on the role of leadership decisions in supporting and promoting research and scholarship. Similarly, the BRC initiatives designed for NAPCRG emphasize core questions pertinent to primary care research, addressing the challenges of finding resources for scholarly activity, harmonizing clinical, quality, and operational priorities through research, and the pivotal role of mentorship in cultivating a culture of inquiry. The BRC curricula tailored for STFM, an organization dedicated to developing a proficient family medicine workforce, explores the symbiotic relationship between research and education, and often focuses on educational research methodology, which is of particular interest to family medicine’s community of educators.

No matter the venue, BRC presentations create space for dialog to ask what “research capacity” means to individual departments, programs, and researchers. Participants are challenged to examine the meaning of scholarly activity in their context. Participants leave with practical action steps to harmonize their organization’s research across all mission areas, engage faculty in scholarship, and increase research capacity regardless of the current level of scholarly activity in their context.

Assessments and Evaluations

The BRC Program has undertaken a deliberate evaluation of its outreach efforts, particularly focusing on conference presentations and consultations. These efforts are directed by an Assessments and Outcomes committee within BRC. Initial evaluations have focused on short-term outcomes for consultations; format, presentation, and topics addressed through curriculum workshops and

Table 3. List of Building Research Capacity (BRC) Presentations from Inception of BRC through 2023

Year	Conference	Title
2016	NAPCRG	BRC Launch - Building a culture of inquiry in departments and residency programs
2016	NAPCRG	Role of leadership and senior management in facilitating or impeding scholarship and research development
2017	ADFM	Joy in Research: The Role of the Administrator-Chair Partnership in Inspiring Research
2017	STFM	Creating a Culture of Inquiry in Academic Family Medicine
2017	NAPCRG	Means to Meaningful Mentorship
2018	ADFM	What Does Building Research Capacity Mean to Departments of Family Medicine: A BRC Dialogue
2018	STFM	Should Family Medicine Educators be Expected to Do Research: A Point-Counterpoint Debate
2018	STFM	I Am Not a Researcher: Why Should I Do Research? How Participation in Research Makes ME a Better Family Medicine Educator
2018	NAPCRG	Promoting Research and Scholarship in Family Medicine: Finding the Time and Money to Support It: A Building Research Capacity (BRC) Workshop
2019	ADFM	Key Chair Decisions in Building Research and Scholarship Capacity
2019	STFM	Quality Improvement Projects as Research: A Building Research Capacity (BRC) How-To Workshop
2019	NAPCRG	A BRC Forum: How to Do Feasible and Gratifying Research by Aligning with Clinical, Quality and Operational Priorities
2019	NAPCRG	Building Research Capacity: Gathering US and Canada Chair and Research Leader Priorities and Practical Strategies
2020	ADFM	The Leader's Guide to Decision-Making When Building Research and Scholarship Capacity (preconference workshop)
2020	STFM	Creating Great Educational Research Projects - A Building Research Capacity (BRC) Session
2020	NAPCRG	Strategies to Address Research Challenges and Opportunities in the Midst of a Global Pandemic: A BRC Workshop
2020	NAPCRG	Building Research Capacity: From Priorities and Strategies to Department Actions (preconference workshop)
2020	FMEC	Building Research Capacity: From Priorities and Strategies to Action
2021	ADFM	Research in the Era of Crises: COVID, Health Equity, Population Health, or Making a More Equitable Research Enterprise (preconference workshop)
2022	ADFM	Creating a Strategic Plan for Research in Your Department
2022	STFM	Fulfilling Your Program's Scholarship Requirements Through Readily Available Resources and Creative Strategies
2022	NAPCRG	Utilizing Research Indicators to Boost Your Department's Effectiveness
2023	ADFM	Building Research Capacity: Change Management, A Tool for Meeting your Department's Research Goals
2023	STFM	Increasing Research Capacity: How Much Is Right for You?
2023	NAPCRG	SPARC Presentations: Strategic Plans to Advance Research Capacity by graduates of the Building Research Capacity Fellowship
2023	NAPCRG	The Joy of Research: Discovering, Rediscovering, and Growing It
2023	NAPCRG	Strategies to Keep Your (Post-Pandemic) Research Moving Forward

Abbreviations: PCRG, North American Primary Care Research Group; ADFM, Association of Departments of Family Medicine; FM, Society of Teachers of Family Medicine; EC, Future of Medical Education in Canada.

seminars; development and implementation of the BRC Fellowship; and overall quality improvement of BRC activities.

Feedback from more than 15 organizations who have completed a BRC consultation demonstrates tremendous success of the initiative. These evaluations reveal the ways that departments have achieved their research goals, such as increased grant funding. Other departments report improvement in their range of

scholarly activity and their efforts in harmonizing clinical, research and education activities. In some cases, individual faculty members have pursued specific goals, such as the BRC Fellowship.

The BRC Fellowship is assessed through observed program outputs (to include department bibliometric data and a research strategic plan) as well as participant evaluations. Fellows express satisfaction with both the curriculum and with their ability to provide

input to improve it. One example of a curricular improvement from feedback is the development of the SPARC Presentations at the NAPCRG annual meeting. During these presentations, graduates demonstrate the substantial progress made during the fellowship and deliver the strategic plans they developed during their fellowship. The SPARC Presentations have been well-received by NAPCRG attendees.

Fellows also report substantial growth in themselves and their departments following the fellowship. Three success stories include the first fellow now serving as BRC Fellowship codirector. Another fellow increased research production in her department by promising potential researchers fun as a reward for exploring scholarship opportunities. A third is the peer support received during and after the program which has allowed fellows to increase research capacity and production in their organizations despite the dynamic nature of primary care and academic medicine.

Evaluations of conference presentations have explored participants' research expertise, interest in presented topics, and potential interest in a BRC Consultation. Feedback consistently reveals positive reception, such as a participant from a conference at STFM who declared, "This was the best workshop in the whole conference!" Participants especially appreciate carefully chosen examples, frank discussion of research development initiatives, identification of important goals, mentorship, and IRB issues. Comments and suggestions help presenters improve future presentations and provide insight into future topic selection.

Future of BRC

There is a growing need for organized efforts in primary care research capacity development, and BRC is positioned to provide ongoing leadership and direction.⁵ There is a great deal of synchronization between the consultation, fellowship, presentations, and assessment initiatives. Each of these facets of BRC aims to address family medicine research needs on the individual, team, institutional, and network levels.

A targeted area of growth for BRC is expansion and diversification. As family medicine continues to evolve, BRC aims to expand its reach across a wider spectrum of academic institutions, community-based

residencies, and other research settings such as practice-based research networks. Over time, BRC has been expanding into a scholarship-producing organization, helping direct research efforts in the field of research capacity development. For example, BRC has piloted the use of tools for assessing research capacity, including The Association of Departments of Family Medicine's Research Capacity Scale (RCS).⁶

Collaboration is another cornerstone of BRC's future efforts. Strengthening partnerships with allied organizations, academic bodies, and research conferences will help lay the groundwork for continued knowledge exchange. Synergistic efforts between individuals and across organizations and disciplines will help propel family medicine research to new heights.

Future-proofing the BRC Program involves a steadfast commitment to iterative evaluation and adaptation. Innovative exploration of research capacity within primary care will lead to distribution of scholarship that can result in up-to-date tools, mentorship, and resources for navigating research development. More robust and comprehensive evaluation of consultations, fellowship experiences, and presentations will help refine strategies to align with the ever-changing needs of the family medicine community.

The future of BRC stands as a testament to the unwavering dedication of family medicine to transformative growth, collaboration, and support of a diverse cohort of family medicine scholars. Through a blend of innovation, inclusivity, and adaptability, BRC is charting a course to drive family medicine toward new horizons of excellence.

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To see this article online, please go to: <http://jabfm.org/content/00/00/000.full>.

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