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THE TRANSCENDS PROGRAM: RATIONALE AND OVERVIEW

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Abstract

Early-career academic faculty from underrepresented minority groups are underrepresented among medical school faculty, less likely to receive research grants, less likely to be promoted, and report lower career satisfaction. The Training in Research for Academic Neurologists to Sustain Careers and Enhance the Numbers of Diverse Scholars (TRANSCENDS) program was established as a research training and mentoring program to foster careers of diverse early-career individuals in neurology. Early career individuals from underrepresented groups in the biomedical-research workforce were selected from applicants during the initial cycle (2016-2020). An innovative component of TRANSCENDS is the incorporation of multiple training activities including: an online graduate research degree program; monthly webinar conferences; specific interaction sessions at the annual American Academy of Neurology meeting and year-round communications between matched mentors and mentees. The program complements these attributes with the Master of Science in Clinical Research (MSCR) degree that includes the competencies for the clinical and translational research workforce. The TRANSCENDS Scholars are assessed on a regular and ongoing basis to evaluate impact and identify components that need to be enhanced. The assessment of the first cycle indicated high enthusiasm from the scholars, mentors and faculty with identification of specific activities for enhancement. The results of the evaluation clearly identified a high satisfaction with the TRANSCENDS program indicating a significant impact on the clinical neuroscience research workforce of diverse underrepresented clinical neuroscientists equipped to be successful academic researchers.

Keywords

Training; Mentoring; Underrepresented; Diversity; Workforce; Biomedical Research; NINDS; AAN; Career Development

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INTRODUCTION

It has been well documented that underrepresented minority (URM) clinical researchers are: inadequately represented among medical school faculty,¹⁻³ less likely to receive NIH research awards (Table 1),^{4,5} less likely to be promoted,^{6,7} and report lower career satisfaction and higher social isolation/attrition.^{8,9} Indeed, a well-trained workforce of underrepresented in medicine (UIM) faculty is a critical component of research to reduce disparities in neurological outcomes that affect underserved and/or low-income communities,³ as well as a major factor in minority participation in clinical trials.¹⁰ While strong mentorship is a key factor in the success of trainees and early career investigators in academic research settings.¹¹⁻¹⁶ Traditional research mentoring has been less effective for UIM groups.^{17,18} Collaborative programs geared specifically for early career UIM focused on the skills and practices that enhance academic career advancement could improve biomedical research workforce diversity.²⁶

The **T**raini**R**ing in **R**esearch for **A**cademic **N**eurologists to **S**ustain **C**areers and **E**nhance the **N**umbers of **D**iverse **S**cholars (TRANSCENDS) program is a collaborative initiative between the Northern California Research and Education Institute (NCIRE), the Medical University of South Carolina (MUSC) and the American Academy of Neurology (AAN) that was designed to provide development UIM clinical and translational researchers with an innovative training experience and credential. In addition, AAN provides member benefits and in-kind support for a rich array of career development activities at its annual meeting. The overarching goal of TRANSCENDS is to train and inspire UIMs and persons with disabilities who are post-residency fellows and junior faculty to conduct high-quality neurological research and develop successful academic careers.

In addition to providing the essential research competencies with the MSCR credential, the structure of TRANSCENDS as a training initiative award is important as it:

- provides opportunities to engage in independent research
- enables mentees to work with a mentor/PI guiding their research.
- facilitates networking with other scientists in the context of a lab or a research group.
- likely leads to a faculty position, an important milestone in their career development.
- focuses on core competencies: discipline-specific contextual knowledge, career development skills, communication skills, professionalism, leadership and management skills, and responsible conduct of research.³⁵

The overarching goal of the TRANSCENDS program is to foster the development of academic careers of UIM clinical neuroscientists to increase diversity in the academic workforce. TRANSCENDS goals were developed with investigators and academic stakeholders considering **1)** reducing the racial/ethnic gap in the academic workforce; **2)** availability of UIM investigators interested in developing academic careers; **3)** availability of UIM mentors with a proven track record and expertise in the investigation of neurological

disorders; **4**) availability of UIM mentors with a proven track record and expertise in the mentorship of UIM clinical neuroscientists; **5**) specific approaches for UIM developing clinical scientists; and **6**) national neurological societies with a priority for promoting diversity in clinical neuroscience research. TRANSCENDS was conceived on the basis of two established social science models - Azjen's Theory of Planned Behavior and Bandura's Social Cognitive Theory,^{27,28} both of which have been used to guide its programmatic development. In particular, the proposed training and mentoring curriculum was aimed at helping UIM scientists to develop academic careers through enhanced academic self-efficacy, the premier predictor of academic success.^{27,28} Furthermore, our program was anchored by Uri Treisman's observations of UIM scientists and the Ibarra-Thomas theory that UIM scientists need mentorship to succeed academically.³⁶⁻³⁸

The development of the TRANSCENDS program was also consistent with the broad, trans-NTH strategy to promote diversity in the academic workforce with a novel comprehensive career development opportunity including: **1**) its theoretical and evidence-based foundation; **2**) incorporation of formal training in clinical research methodology with attainment of a solid credential – a Master of Science in Clinical Research (MSCR) degree; **3**) commitment from a cadre of nationally-distinguished investigators in clinical neuroscience research; **4**) congruent mentoring system designed to optimally cater to the needs of individual scholars; **5**) robust in- person and online networking activities aimed at enhancing professional advancement; **6**) comprehensive and rigorous program evaluation methods; and **7**) a close collaboration with the American Academy of Neurology—the largest association in the country catering to the professional development of neurologists to provide enriching annual events geared at broadening the exposure of trainees to important opportunities designed to lead to a successful and independent research career in clinical neuroscience research. TRANSCENDS represented a novel approach to impact the needs for the neurology academic research workforce.

PROGRAM OBJECTIVES

First, TRANSCENDS seeks to select and retain a group highly promising UIMs and persons with disabilities who are junior faculty or post-residency fellows committed to pursuing research careers in the field of clinical neurosciences. Potential scholars are selected from a national pool of applicants. Second, the program aims to increase scholars' scientific knowledge, professional development skills, motivation to continue pursuing a career in research, and credentials to pursue independent research careers in the field of clinical neurosciences. This aim is achieved via exposure to instruction designed to enhance career development skills and development of successful grant applications, including the attainment of a MSCR degree from MUSC. The primarily on-line curriculum is supplemented with on-site activities at the AAN annual meeting comprising didactics, a poster session, and mentoring encounters. Third, TRANSCENDS aims to enhance mentoring benefits and networking opportunities for diverse scholars. Mentoring elements are enhanced year-round through regular assessment of mentoring progress, and a peer mentoring network.

PROGRAM Organization

1. Program Executive Committee

An Executive Committee (EC) provides a forum for program development, management and evolution together with input from a core group of faculty. There are a total of six Executive Committee members including important figureheads in the field of neurology with expertise in the following fields: vascular neurology, epidemiology, movement disorders, and epilepsy. The Executive Committee notably comprises the Editor-in-Chief of *Neurology*, the past president of the World Hypertension League, the Medical Director of the Hauenstein Neuroscience Center, the Director of the Movement Disorder Center at University of California San Diego, and the Chief-of-Staff at the San Francisco VA Healthcare System. They are also all seasoned researchers, mentors, and leaders.

2. Program Faculty

The program faculty is a group of funded scientists and/or academic leaders with very strong training or administrative records whose expertise and interests are highly relevant to clinical neuroscience research and policy-making. These faculty members comprise the mentor pool for scholars in our program.

3. Program Scholars

- a. Eligibility - Eligible scholars include those in an early neurology career stage who are disabled and/or belong to an underrepresented minority in medicine.
- b. Recruitment – The program is promoted through the AAN’s communications mechanisms including newsletter, trainee educational materials, and journals as well as on the AAN Web page. To further promote the program, a TRANSCENDS presentation takes place at the AAN annual meeting in the Research Corner to showcase the opportunity, in addition to the TRANSCENDS section of the larger poster session. In addition, the program directors promote TRANSCENDS at other academic conferences including American Neurological Association, Child Neurology Society, American Stroke Association, National Medical Association, etc. TRANSCENDS is also promoted through the national CTSA network, to which MUSC belongs. Additional recruitment efforts include strengthening AAN collaborations with the NIH-funded Specialized Neuroscience Research Programs (SNRPs) and Stroke Prevention/Intervention Research Programs (SPIRPs).
- c. Scholar Selection – Each applicant must provide: (1) TRANSCENDS application form which includes a plan consisting of one to two brief paragraphs for each of the next two years highlighting research and programmatic plans, (2) an essay describing professional goals and what the applicant hopes to gain from the fellowship, (3) resume/CV that includes a full list of publications, conference presentations, scholarships, honors, awards, and any scientific associations or committee membership, (5) current biosketch, and (6) two letters of recommendation. Selection Committee members review, and rank applicants based on these five criteria across 5 domains (Table 1). The Selection Committee

includes the two program directors and the program coordinator, with ad hoc input from the Executive Committee. Each person provides a list of their top 5–6 scholars based on the criteria. Highly ranked applicants that are common among the lists are considered accepted into the program. For those that are not mutually agreed upon, the applicants are discussed in greater detail to determine the strengths and weaknesses before coming to a consensus. Subsequently, two mentors are identified for each scholar based on his or her preference in regard to career development. Each scholar is also assigned a peer mentor during the program. TRANSCENDS activities are designed to increase the number and diversity of applicants and ensure that highly qualified scholars are selected from a competitive applicant pool.

PROGRAM ACTIVITIES (Table 2)

1. MSCR degree

With the goal of providing a formal credential indicating a fundamental knowledge in clinical research methodology, a major component of the TRANSCENDS program is the attainment by its scholars of a MSCR degree offered online by MUSC. The MSCR curriculum is based and modified as needed on the competencies associated with clinical and translational research.³⁹ The MSCR program trains individuals to become principal investigators on grants, faculty in medical schools and clinical research team leaders. The program is compliant with core competencies recommended by the National Center for Advancing Translational Science (NCATS) in collaboration with the NIH Clinical and Translational Science Award (CTSA) Education and Career Development Key Function Committee. The degree is granted through the MUSC College of Graduate Studies and includes 38 credit hours. The curriculum and courses are recorded with Panopto system and maintained with the Harbor platforms. The MSCR curriculum program includes:

- a. Grants Development for Clinical Research
- b. Critical Review of the Literature
- c. Clinical Biostatistics
- d. Clinical Epidemiology
- e. Comparative Effectiveness Research
- f. Leadership
- g. Team Science
- h. Responsible Conduct of Research and Ethical Issues in Clinical Research

In addition to the formal courses, the MSCR includes resource faculty to provide advice and recommendations for specific research projects and includes review and feedback with mock study sections. These components complement the mentorship from TRANSCENDS. The success of structured training programs such as the MSCR is flexibility.⁴⁰ As with TRANSCENDS, the MSCR training component works with the individual trainees to tailor the training content for the individual career goals. The MSCR diploma and credential

provide a tangible indicator of accomplishment and commitment to clinical and translational research.

4. AAN Affiliation

- a. *AAN Annual Meeting Support* – For each year of their fellowship, scholars are provided a stipend from TRANSCENDS funds to cover AAN meeting attendance expenses, including airfare, lodging, meals and incidentals.
- b. *Networking* - The first TRANSCENDS networking event is an orientation session held early during the AAN annual meeting. The orientation allows scholars, new and veteran, to meet each other, the directors, and AAN staff. Scholars receive an overview of the program, its benefits, and expectations along with applicable AAN policies. The current AAN president or another high-ranking AAN representative is asked to give a short speech about diversity in neurology (either at the orientation or at the mentor-scholar breakfast). Former scholars, EC members, established mentors, and representatives from NINDS are invited to the luncheon. The cost of the luncheon is provided by AAN as an in-kind contribution.
- c. *Poster Session* – The premier event featuring the research of TRANSCENDS scholars at the AAN annual meeting is the poster session. The poster session allows scholars to display their research posters in an exclusive section. TRANSCENDS scholars, advisors, mentors, NIH partners and members of the Executive Committee are invited to this event. The event is also open to all AAN attendees.
- d. *AAN Membership* – As in-kind financial contribution from AAN, scholars were provided complimentary AAN membership for the two years of their fellowship. AAN membership has a wealth of benefits.

3. Mentoring

- a. *Determining Individual Mentoring Needs* - As a first and critical step in the mentoring program for the scholars, the TRANSCENDS program directors, through a one-on-one discussion and entrance interview, assess each scholar's needs and expectations for mentoring. In addition to using this information for mentor-mentee matching, the program identifies common themes/topics that could be addressed through the various mentoring activities, recognizing that each scholar's individual mentor cannot meet all of the scholar's needs or offer all perspectives.
- b. *Mentor Recruitment and Mentor-Mentee Matching* – Each year, two mentors are recruited for the scholars based on their career interests and professional development needs. In the Winter before the AAN annual meeting, scholars are matched with mentors by the TRANSCENDS program directors. Program staff inform both the scholar and mentors of the match, provide contact information, and strongly encourage communication prior to the annual meeting. Matches are created based on the needs of the mentee and the resources/experience of the

mentor, not solely based on common research interests. In addition, preference is given to those investigators with a positive history of training students, ongoing research achievements as evidenced by publications in peer-reviewed journals, and the bandwidth and willingness to make the time commitment to the proposed project. The program has assembled a select group of outstanding faculty (mentors/advisors) with national recognition in the field of clinical neuroscience research. Most importantly, they are well regarded and accomplished researchers who have a talent for motivating mentees to achieve their academic and professional goals.

- c. Mentorship Team - The TRANSCENDS primary mentors are called upon to assist mentees on: (1) providing advice on a program of scholarly development, (2) offering or creating opportunities for their professional development, and (3) engaging other advisors with complementary skills in mentorship and collaborative activities. Enlisting the active participation of a network of advisors encourages and nudges the mentors to fully participate in mentorship despite their busy schedules. Accordingly, the scholars receive mentorship from both established mentors and an active network of peer mentors, which is critical to ensure successful academic careers down the line. In rare situations where a mentor-mentee relationship does not seem to be prolific for one or both parties, the TRANSCENDS program directors speak with the mentor and the mentee to assess the best way forward. If necessary, the directors (along with input from the scholar) will assist in finding a new mentor for the scholar.
- d. Mentor-Scholar Breakfast – The first formal face-to-face meeting occurs at a two-hour Mentor-Scholar Breakfast at the AAN meeting, to which scholars, mentors, executive committee, and NINDS partners are invited. Roundtable seating arrangements by AAN staff and the TRANSCENDS Program facilitate the communication at this event. This event is an opportunity for all of the scholars, mentors, and NUT partners to interact together and discuss feedback for the program and gear up to have a successful experience for the incoming scholars. It is also a setting where scholars can meet their TRANSCENDS mentors, enjoy a meal together, and plan for the week ahead. At the breakfast, mentors and scholars are encouraged to schedule additional meetings throughout the week and to maintain communication after the meeting.
- e. Peer Mentoring Network – The program directors and program coordinator assign each incoming scholar (apart from the first year of the program) to a second-year scholar as a mentor. During the program, the pairs have opportunities at the AAN annual meeting to meet and interact in person. They are also encouraged to communicate outside of the meeting. As a larger group, the scholars set up their own Slack communication where they regularly touch base with one another across cohorts.

4. Communications Network & Resources

An email communication called *TRANSCENDS Tributes* is disseminated at least quarterly. The *TRANSCENDS Tributes* is shared with our larger TRANSCENDS community and

highlights the professional career development accomplishments of the scholars in the program. Additionally, the scholars created a TRANSCENDS Slack communication amongst themselves, which has contributed greatly to their peer support and rapport with one another. There is also a TRANSCENDS LinkedIn group as an online alumni network through which program participants – current and former – can share information, experiences and support each other’s career development. Previous scholars are encouraged to use the TRANSCENDS web-based social network to enhance communication, send announcements, and discuss opportunities for UIM scientists. It is expected that the mentor-mentee and the mentee-mentee relationships will be transformed over time into peer-to-peer friendships, lasting beyond the program. Scholars also benefit from monthly TRANSCENDS conference calls with the program, where mentees are asked to present their research ideas and/or preliminary data. During such calls they receive feedback from invited faculty mentors as well as their peers, which affords the scholars the opportunity to finetune their research and presentation skills. Challenges encountered during the course of proposal development are discussed and faculty provide solutions to overcome those challenges. Moreover, the calls serve as a forum for career development discussions on topics such as promotion, negotiations with department Chairs and balancing clinical and research duties. The program coordinator records attendance on the calls.

PROGRAM EVALUATION (Table 3)

Evaluation of a program is critical to measuring its successes and failures, and to designing new practices to achieve objectives. TRANSCENDS aims to improve program performance, ensure optimum use of resources, and provide feedback for programmatic decision-making. Routine program data collection and analysis of inputs/outputs, questionnaires and surveys serve as the primary mechanisms for monitoring progress and evaluating the program’s success in reaching its goals and objectives. Information is used on an ongoing basis during the funding period, to provide a feedback loop for any adjustments or improvements that may be required to strengthen the program. TRANSCENDS utilizes the Monitoring and Evaluation Strategy and Framework. For each program objective, expected outputs and outcomes have been identified, along with indicators for measurement, targeted benchmarks and data sources. Inputs include skills the scholars hoped to develop in the program, professional development issue being faced by the scholars, what scholars ultimately hoped to get out of the program, and their short-term career goals. Outputs include professional skills scholars felt they gained, strengths of TRANSCENDS, mentoring experiences, and avenues to improve the program. Benchmarks include overall number of peer review publications, number of significantly authored peer review publications (first, second, senior, or corresponding author), extramural presentations, intramural presentations, grants submitted, grants obtained, memberships/fellowships in national professional organizations and major awards.

TRANSCENDS scholars are followed and assessed annually with the Evaluation Assessment Instrument developed for the project. In addition, the program aims to maintain regular contact with the scholars for years after the training program to assess long-term career effects and to form an alumni and ambassador network. Training and program

curriculum are modified and enhanced based in part on the feedback from these evaluations. TRANSCENDS Evaluation Plan includes:

- a. Completion of MSCR degree – Successful defense and completion of all degree requirements.
- b. Entrance and Exit interviews – Shortly after scholars have been selected, the program coordinator solicits an entrance interview from the scholar using a structured set of questions to gather information about their professional skills development needs, a self-assessment of their degree of mastery of professional skills, current mentoring situation and mentoring needs, expectations for the program, etc. In addition, one of the program directors has a one-on-one conversation with each scholar to further delve into the scholar's academic interests and mentoring needs. The information is used both to maximize each scholar's fellowship experience as well as to provide baseline data. At the end of each 2-year fellowship, the scholar completes an exit interview using a structured set of questions to obtain a more qualitative assessment of each scholar's experience with the program. Interview results are compiled and analyzed for trends and are used as part of overall program evaluation towards the end of the five-year program period.
- c. Post-annual meeting survey – Current scholars are asked to complete a brief online questionnaire following each AAN annual meeting they attend during their fellowship. The purpose is to determine what the scholars believe they have gained from the experience, as well as to obtain feedback on the various activities offered to the scholars. The survey is standardized to enable direct comparison across years and informs any necessary program adjustments.
- d. Survey of Mentors – To monitor the effectiveness of the program's mentoring component from the mentors' perspective, a brief online questionnaire is administered annually to elicit feedback from mentors regarding their mentoring experience and the progress of their mentees.
- e. EC check-in reports – Members of the EC conduct twice-yearly phone check-ins about the program in order to discuss progress with scholar participation and preparation for the next cycle of applications.
- f. Five-year program assessment – During the fourth year of the program, TRANSCENDS is collecting and analyzing data related to the current funding cycle in order to report on achievement of outputs and outcomes listed in the M&E framework (Table 3). The assessment report will be included as part of the final year's progress report as well as in any funding renewal application.

DEMOGRAPHIC AND SPECIALTY BREAKDOWN

During the first cycle of the TRANSCENDS program, there have been a total of 32 applicants across four application cycles: 17 females and 15 males including 11 Black/African American, 17 Hispanic/Latino, 1 native Hawaiian/Pacific Islander, 2 biracial, 1 East Indian including 1 disabled person. The career status of the applicants was as follows: 9

assistant professors, 1 vascular neurology fellow, 3 movement disorders fellows, 1 pediatric neurologist, 1 intensive care unit/EEG fellow, 1 neuro-immunology/Multiple Sclerosis fellow, 1 neurology instructor, 1 neurology fellow, 1 clinical research fellow, 2 epilepsy fellows, 1 sleep medicine fellow, 5 neurocritical care fellows, 1 neuro-immunology fellow, 1 neuro-HIV/neuroimmunology fellow, 1 staff neurologist, and 2 neurology PGY-4 residents. Out of the applicant pool, a total of 23 scholars have been accepted throughout the lifetime of TRANSCENDS.

CHALLENGES

There are several challenges related to the design of the TRANSCENDS program that need to be mentioned. Firstly, there is a selection bias during the application process since neurologists who are highly motivated and have the departmental support to participate in the program may have been the most successful in pursuing their academic neurology careers. Secondly, aside from self-report feedback, it is impossible to quantify to what extent scholar productivity in relation to grants, publications, and presentations are directly attributed to TRANSCENDS. Thirdly, participation in the TRANSCENDS program entails quite a bit of time commitment and time management, specifically as it relates to the MSCR degree. However, the program continues to receive positive qualitative feedback about the program and the powerful positive influence of the mentorship and MSCR.

SUMMARY

As of September 2020, 11 TRANSCENDS scholars have successfully completed the MSCR degree at MUSC as TRANSCENDS Scholars. One graduated scholar had completed the MSCR degree prior to TRANSCENDS. 10 scholars are currently enrolled in the MSCR and 2 additional scholars withdrew from the MSCR (as well as the TRANSCENDS program overall) due to personal reasons. We are optimistic that the aims of the TRANSCENDS will be achieved with significant impact on the diversity in the clinical neuroscience research workforce. The evaluation process will provide the Executive Committee needed data to improve the program throughout the funding period, generating a refined Training and Mentorship Curriculum adaptable to other settings. With a strong commitment to the TRANSCENDS mission, the program is constantly assessed with enhancements made to provide the scholars with the best experience. It is expected that the TRANSCENDS program will result in a large return on investment measured in terms of grants obtained by mentees and an increased number of independent investigators in clinical neuroscience research. This will also result in the creation of a national network of UIM clinical neuroscientists empowered to utilize their acquired research and professional skills to reduce the burden of neurological disease in the United States and beyond.

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HIGHLIGHTS

- The Training in Research for Academic Neurologists to Sustain Careers and Enhance the Numbers of Diverse Scholars (TRANSCENDS) program was established as a research training and mentoring program to foster careers of diverse early-career individuals in neurology.
- Early career individuals from underrepresented groups in the biomedical-research workforce were selected from applicants during the initial cycle (2016-2020).
- Innovative training activities include: an online graduate research degree program; monthly webinar conferences; specific interaction sessions at the annual American Academy of Neurology meeting and year-round communications between matched mentors and mentees.
- The results of the evaluation clearly identified a high satisfaction with the TRANSCENDS program.
- It is expected that the TRANSCENDS program will result in a large return on investment measured in terms of grants obtained by mentees and an increased number of independent investigators in clinical neuroscience research.

Table 1.

Domains Used in Assessing Applicants to the TRANSCENDS Program

Item	Description
<i>Track record</i>	Creativity of the candidate and ability to work in a multidisciplinary environment; this includes area of expertise and previous training experience teaching, funded grants, publications, scientific presentations, and leadership positions
<i>Research Plan</i>	Scientific merit, significance to the field, potential clinical importance, and feasibility of the proposed research plan or hypothesis to be tested
<i>Training Plan</i>	Quality and appropriateness of proposed mentors and advisors and time commitment to interact with mentoring team
<i>Resources</i>	Institutional commitment and resources available to develop and complete proposed research projects and suitability of the available clinical and laboratory infrastructure (i.e. protected time, funding, support from the department)
<i>Career Potential</i>	Likelihood that candidate will develop a career as an outstanding investigator and have an important impact in their respective field and on clinical neuroscience in particular (i.e. indications of strong research interests, a thought-out action plan, demonstration of the determination to utilize resources to achieve career objectives)

Table 2.

Snapshot of TRANSCENDS Program Objectives and Activities to Meet Them

ACTIVITY	Objective 1: Recruitment & Selection	Objective 2: Knowledge & Skill building	Objective 3: Mentoring & Networking	Objective 4: Program Evaluation
<i>Diversity Recruitment</i>	X			
<i>Scholar Selection</i>	X			
<i>MSCR Degree</i>		X		
<i>✓ Novel Courses</i>		X		
<i>✓ Mock Study Section</i>		X	X	
<i>AAN Annual Meeting</i>		X	X	
<i>✓ Diversity Fellows Poster Session</i>		X	X	
<i>✓ Professional Development Workshops</i>		X	X	
<i>✓ Scientific Workshops and Courses</i>		X	X	
<i>✓ AAN membership</i>			X	
<i>Determining Individual Mentoring Needs</i>			X	
<i>Mentor Recruitment and Mentor Matching</i>			X	
<i>Mentor-Scholar Breakfast</i>			X	
<i>Faculty Panel</i>				
<i>Peer Mentoring Network</i>			X	
<i>Mentor recognition</i>			X	
<i>Diversity Reception</i>			X	
<i>Liaising with Scholars from Other Diversity Programs</i>			X	
<i>Communications Network and Resources</i>			X	
<i>Monitoring</i>				X
<i>✓ Entrance & Exit Interviews</i>				X
<i>✓ Post-Annual Meeting Survey</i>				X
<i>✓ Annual Progress Report</i>				X
<i>✓ Survey of Mentors</i>				X
<i>✓ EC Check ins</i>				X
<i>Reporting</i>				X
<i>✓ Use of Informatics</i>				X

Table 3.

Schedule for collecting TRANSCENDS quantitative evaluation data

Evaluation Forms	Before I	After I	After Midyear Meeting	After II	Yearly Intervals
<i>Mentee background</i>	X	Update	Update	Update	Update
<i>Progress satisfaction</i>		X	X	X	X
<i>Attitude about Mentor</i>	X	X	X	X	
<i>Evaluation of Mentor</i>		X	X	X	
<i>Experience Level</i>	X	X	X	X	X
<i>Feedback on program</i>		X	X	X	
<i>Overall evaluation</i>		X	X	X	
<i>Final summary</i>		X	X	X	
<i>Lectures / Labs</i>		X	X	X	
<i>Mentors evaluation of mentee</i>		X	X	X	
<i>Publications/Grants</i>	X	Update	Update	Update	Update
<i>Progress reports</i>	Monthly (through end of training period)				

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