Ten Salient Practices of Undergraduate Research Mentors

Shanahan, Ackley-Holbrook, Hall, Stewart, & Walkington (2015)

Strategic Pre-Planning
Consider the variability in students' levels of preparation, motivation, and skills, and be ready to guide their progress. Consider projects that (1) begin at a level students will understand, (2) draw on skills students already have, (3) have a modest but expandable scope, and (4) have a chance of producing results.

Set Clear and Well-Scaffolded Expectations
To facilitate a scaffolded approach, develop a clear, structured plan and outline expectations with students through contracts, syllabi, or similar documents. Also consider outlining expectations related to interpersonal dynamics to provide students a better understanding of their role and interactions in the research space.

Teach Technical Skills, Methods, and Techniques
Mentors should consider making concerted efforts to get to know mentees as individuals to help meet their emotional needs as well as their learning requirements. This has been found to be especially important for underrepresented minority students involved in UR than for peers in the majority.

Balance Rigorous Expectations with Emotional Support and Appropriate Personal Interest
After preparations have been made, begin instructing students in research procedures, technical skills, methods, and techniques necessary to conduct scholarly work in your discipline.

Build Community Among Members of the Team
If working with groups, work to develop trusting interpersonal relationships among team members. In addition to holding regular formal meetings as a team, consider planning informal activities to develop community.

Dedicate Time to One-on-One, Hands-On Mentoring
Students who spend less time with their mentors have been found to hold false assumptions about their progress. Regular one-on-one check-ins promote students' learning and understanding.

Increase Student Ownership Over Time
Encouraging student investment in collaborative projects promotes shared responsibility and shared power. Rather than holding power over students, asking students for feedback about your mentoring and providing opportunities for the student to take ownership of projects promotes students' success.

Support Students' Professional Development Through Networking and Explaining Norms of the Discipline
Explaining norms of the discipline and coordinating connections between students and colleagues in the field provides students opportunities for professional socialization.

Create Intentional Opportunities for Peers to Learn Mentoring Skills
Consider who in your research group may also contribute to the mentorship of students (e.g., graduate students, near-peers) and ensure they are aware of ways to support mentorship of students.

Encourage and Guide Students through the Dissemination of their Findings
Work with you students to ensure they are aware of and supported in the dissemination of their work. They may involve encouraging students in oral and written formats such as conference presentations, research reports, and journal articles.