REQUESTS FOR INDEPENDENT STUDY Duke University – Department of Statistical Science

Trinity College of Arts & Sciences

Independent study enables a student to pursue for course credit individual interests under the supervision of a faculty member. Independent study is of two types: Independent Study (non-research) and Research Independent Study.

STA 291, STA 391, and STA 491: Independent Study: Courses entitled Independent Study are individual, non-research, directed study in a field of special interest on a previously approved topic taken under the supervision of a faculty member and resulting in an academic and/or artistic product. Such independent study courses do not bear a Research (R) code and do not satisfy any general education requirements aside from the Small Group Learning Experience (SGLE) requirement. In Statistical Science, these courses consist of directed readings or work in a field of special interest under the supervision of a faculty member, the central goal of which is a non-research but still substantive paper, project, or written report covering a previously approved topic. Consent of instructor and director of undergraduate studies required. The course should include content and goals requiring performance appropriate to a 200, 300, or 400 level course, respectively, in Statistical Science.

STA 393, STA 493: Courses entitled Research Independent Study are individual research in a field of special interest under the supervision of a faculty member, the central goal of which is a substantive paper or written report containing significant analysis and interpretation of a previously approved topic. Such research independent study courses bear a Research (R) code and satisfy general education Research requirements. One research independent study may be submitted and approved for a Writing (W) code in addition to the R code designation, but no other curriculum code designations are permitted for research independent study courses. Students who wish to request a W code for one research independent study course must take the appropriate form to 02 Allen Building by the end of drop/add for the semester they are enrolled in the course. The request form is available at http://trinity.duke.edu/academicrequirements?p=independent-study-research-w-coding. Note: STA 360 is the prerequisite for STA 493.

Policies:

The following policies apply to both types of independent study¹:

- 1. **Approval** The independent study must be approved by the instructor(s) involved as well as by the Director of Undergraduate Studies.
- 2. Faculty appointment The instructor of record (supervising faculty member) must hold a regular rank faculty appointment at Duke within the Department of Statistical Science. Students can be co-advised by a faculty member outside of the Department. In some cases, there may be an additional instructor who mentors the bulk of the independent study and holds an appointment outside the sponsoring department or program. If this is the case, the supervising faculty member is responsible for submitting the final grade, and ensuring that the instructor adheres to academic standards, policies, and procedures pertaining to undergraduate students in Trinity College of Arts & Sciences
- 3. Course Content / Quality The independent study must provide a rigorous academic experience equivalent to that of other undergraduate Duke courses. A student should expect to spend at least 180 hours, including meetings and readings, on the project over the course of the semester for a 1.0 course credit IS. Independent study courses may not duplicate available course offerings in the semester or summer term in which the independent study is being taken, nor may independent study be used simply to provide low-level support for other projects or to observe or shadow the work of others.
- 4. **Meeting schedule** In addition to the individual effort of the student, which normally entails ~12 hours per week, the student will meet with the instructor of the independent study at least once a week.
- 5. **Final product** The student will produce a final academic product to be completed during the semester for which the student is registered for the course. The final product must be submitted with the Director of Undergraduate Studies as a record of the independent study work completed.
- 6. Grading The instructor will evaluate the work, including the final product, associated with the independent study, and submit a grade by the end of the semester. If the independent study has an instructor in addition to a supervising faculty member, the instructor will consult on the final grade with the supervising faculty member, and the supervising faculty member will submit the final grade.
- 7. **Credit toward a major, minor or certificate** The Director of Undergraduate Studies in the Department of Statistical Science will determine whether an IS successfully completed will count toward the major, minor, or IDM.
- 8. **Research Integrity**: The supervising faculty member will review the need for research protocols regarding protection of human subjects and/or the use and care of vertebrate animals, in accordance with policies of the Duke Campus IRB, Duke Medical IRB, or Duke Institutional Animal Care and Use Committee. NOTE: The department requires students enrolling in a research independent study course (393, 493) to successfully complete the 3 required Undergraduate Responsible Conduct of Research CITI modules and at least one elective (chosen with the instructor), and to attend at least one RCR-related event over the course of the semester. Modules must be

¹ For policies and procedures related to independent study in Study Away programs, see the appropriate Duke GEO Handbook.

identified in the proposal and documentation of modules and events must be provided with the work product at the end of the semester. Per Duke Campus IRB, if this independent study is part of a Graduation with Distinction thesis and is part of a larger project which has research protocols in place, the student must be listed by name in the protocol documentation.

- 9. Independent Study connected to an unpaid internship: The rules for an internship-related independent study are discussed at https://trinity.duke.edu/undergraduate/academic-policies/credit-for-internships. In particular, the following applies: If students want to obtain course credit associated with an internship, they can register for an independent or directed study in which the student collaborates with a faculty member to distill from an internship a certifiable academic experience that qualifies for course credit within the faculty member's department or program. The faculty member is the sole judge of the work necessary to meet these course requirements.
- 10. **No credit for confidential work related to an internship:** The final academic product of the internship becomes a part of the department's archives for accreditation. Faculty and staff members will not sign a non-disclosure agreement in connection with the student's work on this independent study.
- 11. **Provision of contact information for the internship supervisor:** An independent study proposal in connection with an internship must include the name and contact information of the person supervising the internship at the sponsoring organization.

Procedures:

- 1. Students wishing to register for an independent study or research independent study must first make arrangements with a faculty member having expertise in the desired area. The student and supervising faculty member (and instructor, if there is one) should agree on the course title, plan of study, objectives and expectations, as well as on the nature of the final product and evaluation criteria.
- 2. The student will then complete the Permission Form, including a proposal that addresses the required information detailed below. The final document should consist of one pdf including the Permission Form cover sheet, a proposal starting on page 2, and the signature page last.
- 3. After the supervising faculty member is satisfied with the proposal and signs the form, the student submits the complete Independent Study Permission Form (cover sheet, proposal, signature sheet, combined as one pdf document) to the Director of Undergraduate Studies for final approval several days before the end of the drop/add period of the term in which the independent study is to be taken.
- 4. The DUS may require revisions before the form is approved.
- 5. After all signatures are obtained, Mrs. Whitesell will assign and notify the student of the course, section, and permission numbers, will distribute copies via email to student and supervisor, and will archive the final version for the department in Box.
- 6. The student must then register for the course using those numbers.
- 7. At the end of the semester, the student must deliver the final work product to the advisor by their agreed upon schedule as well as to the DUS for archival purposes. The submission must include documentation of fulfilling any RCR requirements, if applicable.

INDEPENDENT STUDY PERMISSION FORM COVER SHEET

Duke University – Department of Statistical Science Trinity College of Arts & Sciences

To the student: Please read the attached policies and procedures, and consult with your instructor / supervising faculty member about course title, description, requirements and expectations. This form must be approved and signed by the supervising faculty member, the instructor (if different from supervising faculty member), and submitted to the Director of Undergraduate Studies or Certificate Program Director before the end of the drop/ add period. After all signatures are obtained, Mrs. Whitesell will assign the course, section, and permission numbers, will distribute copies, and will archive the final version for the department.

Date:								
Studen	t Name:							
	Email:							
	Net ID:							
	Student ID (not unique ID):							
	Graduation Term and Year:							
	Major(s)/Minor(s)/Certificate(s):							
Course	: (Select one)	IS:	STA 291	STA 391	STA 491	Research IS:	STA393	STA 493
	Term and Year:							
	Title:							
	Short Title (max 30 characters) for transcript:							
Superv	rising Faculty Name:							
	Academic Title:							
	Affiliation: Statistical Science							
Instructor (if different from Supervising Faculty) Name:								
	Academic Title:							
	Affiliation:							

Protocol number from Duke Campus IRB, Duke Medical IRB, or Duke Institutional Animal Care and Use Committee, if applicable and brief description of student's role. Please attach pertinent student training documentation if applicable.

This is where your proposal goes. The cover sheet is the first page of your form. Page 2 begins your proposal that addresses each of the following nine information components, clearly identified. If a component is not applicable, say so. Replace this list with your proposal. Add the signature page last. Combine into one pdf document and submit for signatures.

1. Prior independent study

If you have taken prior independent study courses at Duke, please provide information on the semester, course number, department, and supervising faculty member/instructor.

2. Title and description of proposed study

Provide a one to two paragraph description of the proposed study, including topic, course goals, research / readings to be conducted, and a rationale for independent study as opposed to regular course work.

3. Nature of the final product

Describe the nature and length of the final product (e.g., academic paper, artistic product, research report, etc.) .) If this is connected to an internship, the work product of the independent study must be clearly described and related to coursework at a level expected for the independent course number given.

4. Scheduled meetings and work expectations

Provide information on frequency and length of meetings with instructor, and expected work commitments and/or timetables:

5. Grade to be based on

Provide information on how your work in the course is to be evaluated. Please be explicit. Sample text is provided below.

A range - Weekly progress met or exceeded expectations at the course level of the independent study without much prompting; student is able to independently implement methods, correctly interpret and accurately communicate results; the end product is functional and meets expectations; an accompanying write up describing the methodology is produced; reproducibility practices have been used and documented so that the work is reproducible. For research independent studies, results are suitable for inclusion in a celebration of undergraduate research without much revision.

B range - Weekly progress usually met expectations at the course level of the independent study or required only minor prompting; student is mostly able to independently implement methods and correctly interpret and accurately communicate results, but one or more of those areas does not fully meet the expectations outlined in the proposal; interpretation and communication of results is not fully correct, such that the final product / write up is somewhat unclear, not quite accurate, or needs further editing. Some attention was paid to reproducibility practices but their use and documentation was incomplete; the work is probably reproducible. For research independent studies, results might be suitable for inclusion in a celebration of undergraduate research if some revisions are made.

C range or lower - Weekly progress often did not meet expectations at the course level of the independent study and/or student missed many meetings and required much prompting; student has not independently implemented methods and correctly interpreted and accurately communicated results; submitted work and progress, even after revisions, does not fully meet the expectations outlined in the proposal; student does not have a good handle on the methodology and is not able to implement it; a poor final product / write up is produced. The work is not reproducible. For research independent studies, results are not suitable for inclusion in a celebration of undergraduate research unless major revisions are made.

6. Reading list

For a regular independent study, provide a list of texts that will be studied over the course of the semester. For an internship-related independent study, provide a list of sources that will be used in the academic product related to the internship. For a research independent study, provide a bibliography of secondary sources related to your research proposal.

7. Research sources and methods (Research independent study *only*)

For research independent study, provide a description of the primary sources upon which your research will be based and how those sources will serve your research objectives. Data sources must be clearly described. In addition, please

address whether you CURRENTLY have data access. If you do not have access to the data at present, a detailed work-around plan is required (e.g., what will be the final product if data access is not possible). Also briefly discuss approved research protocol, including protocol number, and attach student training documentation, as required by Duke Campus IRB, Duke Medical IRB, or Duke Institutional Animal Care and Use Committee, if applicable. Identify here the RCR modules to be completed during the semester. If other certifications or training are required, please list them as well.

8. External contacts (Internship-related independent study only)

Provide name and contact information of the person at the sponsoring organization who has the authority to allow the student to release their final product for academic credit. If the academic independent study is required as part of the internship, please provide documentation of the requirement.

9. Resources

Please describe the departmental and university computing resources that will be used in producing the final product of this independent study. Also describe the backup procedures and media that will be used to safeguard the work during the semester.

Signatures:	
Signature of student:	
Date:	
For students enrolling in STA 393 or ST	A 493:
☐ I acknowledge that I need to comple grade for this independent study course	ete the RCR training and submit evidence of completion in order to receive a e.
Approval Signatures: Please read attached policies and proce	edures on independent studies before signing.
Supervising Faculty Member:	Instructor (if different from Supervising Faculty Member):
Name:	Name:
Signature:	Signature:
Date:	Date:
	Director of Undergraduate Studies:
	Name:
	Signature:
	Date:

Complete the form, sign it, and pass it on in pdf form for electronic signatures. Signed form must then be returned to Mrs. Karen Whitesell, the DUS Assistant, karen.whitesell@duke.edu to obtain the course, section and permission numbers. Once those numbers are assigned, the DUS Assistant will archive the signed permission document and will distribute copies to the student, supervising faculty member, and instructor (if different from Supervising Faculty Member).

To be completed by the DUS Assistant:

ASSIGNED COURSE AND SECTION NUMBER:

ASSIGNED PERMISSION NUMBER: