Course Requirement Checklist

PhD in Development, Disease Models & Therapeutics

Baylor College of Medicine

GRADUATE SCHOOL OF BIOMEDICAL SCIENCES

Students Starting Academic Year: **2026-2027**

Foundations Courses (10 credits)**:**				
	GS-GS-6600	Foundations A: Molecules to Systems	6	
	GS-GS-6400	Foundations B: Biostatistics	4	
Program Required Coursework (6 or 7 credits)**:**				
	GS-DD-6211	Model Systems in Developmental Biology & Disease	2	
	GS-DD-6201 *or* GS-DD-6301	Development *or* Human Physiology 1	2 3	
	GS-DD-6214	Method & Logic in Development & Disease Pathophysiology	2	
Additional DDMT Courses (4 additional credits of coursework in GS-DD courses):				
	GS-DD-			
	GS-DD-			
	GS-DD-			
Open Didactic Elective Courses (10 credits):				
Responsible Conduct of Research Courses (4 credits)**:**				
	GS-GS-5101	Responsible Conduct of Research 1	1	
	GS-GS-5102	Responsible Conduct of Research 2	1	
	GS-GS-5103	Responsible Conduct of Research 3	1	
	GS-GS-5104	Responsible Conduct of Research 4	1	
Professional Development Courses (3 credits)**:**				
	GS-GS-5105	Scientific Writing	1	
	GS-GS-5112	Powerful Presentations	1	
	GS-DD-5101	Effectively Writing & Reviewing Proposals	1	
Seminar/Journal Literature Courses:				
	GS-DD-5100	Student Research Seminar	1	
Required in terms 2-5 every year from matriculation through attainment of Permission-To-Write.				
	GS-DD-5110	DDMT Journal Club	1	*4 total cr.*
Required in terms 3 and 4 during the first two years of study.				
Research Hours: In each term, students enroll in the number of credits [beyond other coursework] needed to be enrolled full-time (minimum 3 per term)				
	GS-DD-5030	Research Rotation	Var.	
Taken each term before a mentor is appointed or candidacy is achieved (minimum 3 terms)				
	GS-DD-5040	Special Projects	Var.	
Taken each term after a mentor is appointed, and before candidacy is achieved.				
	GS-DD-5050	Dissertation	Var.	
Taken each term after both a mentor is appointed and candidacy is achieved.				

Graduate Degree Plan

PhD in Development, Disease Models & Therapeutics

Students Starting Academic Year: 2026-2027

General Degree Requirements:

- Completion of at least 180 term hours
- At least 30 of those term hours must be in Didactic courses, including at least 5 term hours of GS-DD courses not otherwise required on the degree plan.
- Completion of at least three terms of Research Rotation before appointing a major advisor
- Students must maintain satisfactory academic progress as detailed in the Student Handbook

Year One Requirements:

Term 1:	GS-GS-6600	Foundations A: Molecules to Systems	3 (Didactic) *(two-term course)*	
	GS-GS-6400	Foundations B: Biostatistics	2 (Didactic) *(two-term course)*	
	GS-DD-6211	Model Systems in Developmental Biology	2 (Didactic)	
	GS-GS-5101	Responsible Conduct of Research 1	1	
		Research Rotation/Elective Course	4	Total to Date
		Total:	12 (7)	12 (7)
Term 2:	GS-GS-6600	Foundations A: Molecules to Systems	3 (Didactic) *(two-term course)*	
	GS-GS-6400	Foundations B: Biostatistics	2 (Didactic) *(two-term course)*	
	GS-DD-6201 or GS-DD-6301	Development or Human Physiology 1	2 (Didactic) 3 (Didactic)	
	GS-DD-5100	Student Research Seminar	1	
		Research Rotation/Elective Course	3-4	Total to Date
		Total:	12 (7)	24 (14)
Term 3:	GS-GS-5105	Scientific Writing	1	
	GS-DD-5100	Student Research Seminar	1	
	GS-DD-5110	DDMT Journal Club	1	
	GS-DD-6214	Method & Logic in Development & Disease Models	2 (Didactic)	
		Research Rotation/Elective Courses	7	Total to Date
		Total:	12 (2)	36 (16)
Term 4:	GS-DD-5100	Student Research Seminar	1	
	GS-DD-5110	DDMT Journal Club	1	
		Research Hours/Elective Courses	10	Total to Date
		Total:	12	48 (16)
Term 5:	GS-DD-5100	Student Research Seminar	1	
		Research Hours/Elective Courses	11	Total to Date
		Total:	12	60 (16)

Year Two Requirements:

Term 1:	GS-DD-5101	Effectively Writing & Reviewing Proposals	1	
		Research Hours/Elective Courses	11	Total to Date
		Total:	12	72 (16)

Term 2:	GS-GS-5102	Responsible Conduct of Research 2	1	
	GS-GS-5112	Powerful Presentations	1	
	GS-DD-5100	Student Research Seminar	1	
		Research Hours/Elective Courses	9	Total to Date
		Total:	12	84 (16)
Term 3:	GS-DD-5100	Student Research Seminar	1	
	GS-DD-5110	DDMT Journal Club	1	
		Research Hours/Elective Courses	10	Total to Date
		Total:	12	96 (16)

Student's Thesis Advisory Committee must be appointed by the end of Term 3 in the student's second year of enrollment.

Term 4:	GS-DD-5100	Student Research Seminar	1	
	GS-DD-5110	DDMT Journal Club	1	
		Research Hours/Elective Courses	10	Total to Date
		Total:	12	108 (16)
Term 5:	GS-DD-5100	Student Research Seminar	1	
		Research Hours/Elective Courses	11	Total to Date
		Total:	12	120 (16)

4 credits of additional GS-DD coursework, plus10 additional didactic hours are required for a total of thirty (30).

Qualifying Exam Requirement:

- Must be taken by the end of the second year of enrollment
- Student must complete all prerequisite activities defined by their program before taking the exam

Course Requirements beyond Year Two:

Year 3, Term 3:	GS-GS-5103	Responsible Conduct of Research 3	1
Year 4, Term 3:	GS-GS-5104	Responsible Conduct of Research 4	1

Recurring requirements through Graduation:

Terms 2-5:	GS-DD-5100	Student Research Seminar	As required
Terms 1-5:	GS-DD-5050	Dissertation	As required*

**Students shall enroll in the number of credits of Dissertation needed to be enrolled full-time (12 credits) each term through Graduation.*

Research Course Work:

GS-DD-5010	Readings	GS-DD-5040	Special Projects
GS-DD-5030	Research Rotation	GS-DD-5050	Dissertation

Additional Development, Disease Models & Therapeutics program didactic courses offered*:

GS-DD-6101	Epigenetics of Reproductive Biology & Early Development	GS-DD-6302	Human Physiology 2
GS-DD-6203	Animal Models of Human Disease	GS-DD-6303	Neural Development
GS-DD-6206	Pathophysiology & Mechanisms of Human Disease	GS-DD-6304	Advanced Topics in Cardiac Pathophysiology & Disease
GS-DD-6208	Evolutionary Conservation of Developmental Mechanisms	GS-DD-6305	Advanced Topics in Vascular Pathophysiology & Disease
GS-DD-6210	Cardiovascular Diseases	GS-DD-6306	Topics in Stem Cell Biology

**Students may select electives from open course options in all graduate programs.*
Courses may be viewed in the Graduate School Bulletin