## **AEROSPACE ENGINEERING (60 Credits)**

**Guided Pathway: Associate of Arts** 

**Concentration: Aerospace Engineering (FULL TIME).** 

For more information, visit www.fgc.edu and your academic advisor.

Meta-major: STEM

University Transfer: UCF, UF

The *Associate of Arts* degree is a collegiate degree program consisting of lower-division courses intended for transfer to baccalaureate programs at the universities listed above<sup>ii</sup>. This plan is for those who are interested in earning a baccalaureate degree in *Aerospace Engineering*.

This is the sequence of courses for students interested in majoring in *Aerospace Engineering* at one of the universities listed above. It does not represent a contract, nor does it guarantee course availability or entry into your university of choice. This pathway presents classes needed for your baccalaureate degree in *Aerospace Engineering*. Courses that complete the degree are listed below. As always, visit your academic advisor each semester to help you keep on track for graduation.



# FULL-TIME Pathway

\*Note: All AA degrees must satisfy the Foreign Language requirement for graduation. Please see catalog\*

SEMESTER BY SEMESTER MAP FOR FULL-TIME STUDENTS

SEMESTER 1	ACTION ITEMS
<b>ENC 1101</b> – Freshman Composition I $^{\mathrm{iv}}$ (Communication core)	<ul> <li>Meet with your advisor to confirm academic and career goals by the end of the semester.</li> <li>REQUIRED: Complete the Computer Competency course within Canvas.</li> </ul>
Choose one: <b>AMH 2010</b> – US History to 1877 <i>OR</i> <b>AMH 2020</b> – US History from 1877 <i>OR</i> <b>POS 1041</b> – American Government iv (Social Science & civic literacy)	<ul> <li>Signup for and pass the Florida Civic Literacy Exam.</li> <li>Consult your advisor to make sure you have met <i>the Foreign Language requirement</i>.</li> <li>At the end of the semester, begin research on college and universities where you want to seek to transfer. Meet with a</li> </ul>
MAC 1105 – College Algebra <sup>iv vi</sup> (Mathematics core)	<ul> <li>career advisor/coach to research your career options with a degree in <i>Aerospace Engineering</i>.</li> <li>Remember to start collecting artifacts from your courses for your Academic &amp; Career Portfolio in SLS 2370</li> </ul>
CHM 2045/L – General Chemistry I/Lab (Physical Science core) (4 cr)	Begin applying for Financial Aid and Scholarships     You can start the FAFSA in October for the next academic year. (i.e., in October 2024, you can complete the FAFSA for if you plan to register for classes at a college or university Fall 2025)
	ER CREDIT HOURS: 13
TOTAL SEMESTI SEMESTER 2	
	ER CREDIT HOURS: 13
SEMESTER 2  Choose one: ENC 1102 – Freshman Composition II <i>OR</i> CRW 2001 – Creative Writing <i>OR</i>	ACTION ITEMS
SEMESTER 2  Choose one: ENC 1102 – Freshman Composition II OR CRW 2001 – Creative Writing OR ENC 1141 – Writing about Literature <sup>iv</sup> (Communication)	ACTION ITEMS      Meet with your advisor to confirm or update your academic/career pathway and program of study.
SEMESTER 2  Choose one: ENC 1102 – Freshman Composition II OR CRW 2001 – Creative Writing OR ENC 1141 – Writing about Literature <sup>iv</sup> (Communication)  MAC 1140 – Precalculus iv (Mathematics core)	ACTION ITEMS   Meet with your advisor to confirm or update your
Choose one: ENC 1102 – Freshman Composition II OR CRW 2001 – Creative Writing OR ENC 1141 – Writing about Literature <sup>iv</sup> (Communication)  MAC 1140 – Precalculus <sup>iv</sup> (Mathematics core)  MAC 1114 - Trigonometry <sup>iv</sup> (Elective Prerequisite)  Choose one: ARH 1000 – Art Appreciation OR HUM 2020 – Introduction to Humanities OR MUL 2010 – Music Appreciation OR THE 2000 – Theatre Appreciation iv (Humanities core)  Choose one: BSC 1005 – Biological Principles for Non-Majors OR Any general education BOT or BSC course (Biological Science) (3-4 cr)	ACTION ITEMS   Meet with your advisor to confirm or update your academic/career pathway and program of study.  Ask about transfer advising to discuss options to pursue the bachelor's degree.  Continue collecting artifacts from courses for your Academic &

(Humanities) iv	<ul> <li>bachelor's degree.</li> <li>Begin applying for Financial Aid and Scholarships</li> <li>You can start the FAFSA in October for the next academic</li> </ul>
MAC 2311 – Calculus I <sup>iv</sup> (Elective Prerequisite) (4 cr)	year. (i.e., in October 2024, you can complete the FAFSA for if you plan to register for classes at a college or university Fall 2025)  Check with your advisor for important deadlines and dates Continue collecting artifacts from courses for your Academic & Career Portfolio in SLS 2370
	ER CREDIT HOURS: 7
SEMESTER 4	ACTION ITEMS
SLS 2370 – Personal Academic & Career Engagement iv (3rd Soc Sci )	
Choose one: SPC 2608 – Public Speaking OR SPC 1017 – Oral Communications OR SPC 1061 – Introduction to Academic and Professional Speaking (Communications)	<ul> <li>Begin applying to your top choice universities.</li> <li>Begin applying for Financial Aid and Scholarships         <ul> <li>You can start the FAFSA in October for the next academic year. (i.e., in October 2024, you can complete the FAFSA for if you plan to register for classes at a</li> </ul> </li> </ul>
PHY 2048C – General Physics with Calculus I (Elective Prereq) (5 cr)	college or university Fall 2025)  • Check with your advisor for important deadlines and dates
MAC 2312 – Calculus II iv (Elective Prerequisite) (4 cr)	
TOTAL SEMESTE	R CREDIT HOURS: 15
SEMESTER 5	ACTION ITEMS
<b>MAC 2313</b> – Calculus III $^{ivv}$ (Elective Prerequisite) (4 cr)	
Choose one: PSY 2012 – General Psychology OR SYG 1000 – Introduction to Sociology OR SYG 2300 – Introduction to Social Psychology OR Any DEP or ECO course (Social Science) IV	<ul> <li>After reviewing your final program of study, apply for Graduation.</li> <li>Meet with your advisor to apply for the degree.</li> <li>Sign up for commencement.</li> <li>Request final transcripts to be sent to the college or university to where you will transfer.</li> </ul>
$\textbf{MAP 2302} - \textbf{Elementary Differential Equations}^{ivv}(\textit{Elective Prerequisite})$	<ul><li>where you will transfer.</li><li>Congratulations, graduate!</li></ul>
PHY 2049C – General Physics with Calculus II (Elective Prereq) (5 cr)	

**ACTION ITEMS** 

Ask about transfer advising to discuss options to pursue the

Meet with your advisor to confirm or update your academic/career pathway and program of study.

**TOTAL SEMESTER CREDIT HOURS: 15** 

AAAE DEGREE MINIMUM: 60 SEMESTER CREDIT HOURS PATHWAY TOTAL: 65-66vi CREDIT HOURS Degree plans may change in later catalogs. You may use this pathway if you entered the college on or before this date. If Students must earn at least 25% of the credit hours (15 hours) required for graduation through instruction by FGC to award the degree. If This is not an official degree plan. For official degree requirements, click here. If You must earn a grade of "C" or better in all Gordon Rule classes.

V This course is only offered in the spring term.

**SEMESTER 3** 

**Choose one:** LIT 2000 - Introduction to Literature OR

Any general education AML, ENL, LIT, PHI or REL courses

Vi If student enrolls ready for MAC 1114/1140, then MAC 1105 is not necessary, bringing the Total Pathway credits to 62-63.

### **AEROSPACE ENGINEERING (60 Credits)**

**Guided Pathway: Associate of Arts** 

**Concentration: Aerospace Engineering (PART TIME).** For more information, visit <a href="https://www.fgc.edu">www.fgc.edu</a> and your academic advisor.

Meta-major: STEM

University Transfer: UCF, UF

The *Associate of Arts* degree is a collegiate degree program consisting of lower-division courses intended for transfer to baccalaureate programs at the universities listed above. This plan is for those who are interested in earning a baccalaureate degree in *Aerospace Engineering*.

This is the sequence of courses for students interested in majoring in *Aerospace Engineering* at one of the universities listed above. It does not represent a contract, nor does it guarantee course availability or entry into your university of choice. This pathway presents classes needed for your baccalaureate degree in *Aerospace Engineering*. Courses that complete the degree are listed below. As always, visit your academic advisor each semester to help you keep on track for graduation.



PART-TIME Pathway

\*Note: All AA degrees must satisfy the Foreign Language requirement for graduation. Please see catalog\*

SEMESTER BY SEMESTER MAP FOR PART-TIME STUDENTS	
SEMESTER 1	ACTION ITEMS
<b>ENC 1101</b> – Freshman Composition I <sup>iv</sup> (Communication core)	<ul> <li>Meet with your advisor to confirm academic and career goals by the end of the semester.</li> <li>REQUIRED: Complete the Computer Competency course within Canvas.</li> <li>Consult your advisor to make sure you have met the Foreign Language requirement.</li> <li>Remember to start collecting artifacts from your courses for your</li> </ul>
MAC 1105 – College Algebra <sup>iv vi</sup> (Mathematics core)	<ul> <li>Academic &amp; Career Portfolio in SLS 2370</li> <li>Begin applying for Financial Aid and Scholarships         <ul> <li>You can start the FAFSA in October for the next academic year. (i.e., in October 2024, you can complete the FAFSA for if you plan to register for classes at a college or university Fall 2025)</li> </ul> </li> </ul>
	TER CREDIT HOURS: 6
SEMESTER 2	ACTION ITEMS
Choose one: ENC 1102 – Freshman Composition II <i>OR</i> CRW 2001 – Creative Writing <i>OR</i> ENC 1141 – Writing about Literature <sup>iv</sup> (Communication)	At the end of the semester, begin research on college and universities where you want to seek to transfer. Meet with a
MAC 1140 - Precalculus iv (Mathematics core)	<ul> <li>career advisor/coach to research your career options with a degree in <i>Aerospace Engineering</i>.</li> <li>Continue collecting artifacts from courses for your Academic &amp; Career Portfolio in SLS 2370</li> </ul>
Choose one: BSC 1005 – Biological Principles for Non-Majors <i>OR</i> Any general education BOT or BSC course (Biological Science) (3-4 cr)	
TOTAL SEMESTE	R CREDIT HOURS: 9-10
SEMESTER 3	ACTION ITEMS
MAC 1114 - Trigonometry iv (Mathematics core)	Meet with your advisor to confirm or update your academic/career pathway and program of study.
Choose one: AMH 2010 – US History to 1877 <i>OR</i> AMH 2020 – US History from 1877 <i>OR</i> POS 1041 – American Government iv (Social Science & civic literacy)	<ul> <li>Signup for and pass the Florida Civic Literacy Exam.</li> <li>Continue collecting artifacts from courses for your Academic &amp; Career Portfolio in SLS 2370</li> </ul>
Choose one: ARH 1000 – Art Appreciation <i>OR</i> HUM 2020 – Introduction to Humanities <i>OR</i> MUL 2010 – Music Appreciation <i>OR</i> THE 2000 – Theatre Appreciation <sup>iv</sup> (Humanities core)	Begin applying for Financial Aid and Scholarships     You can start the FAFSA in October for the next academic year. (i.e., in October 2024, you can complete the FAFSA for if you plan to register for classes at a college or university Fall 2025)
	TER CREDIT HOURS: 9
SEMESTER 4	ACTION ITEMS
MAC 2311 – Calculus I <sup>iv</sup> (Elective Prerequisite) (4 cr)	Meet with your advisor and ask about transfer advising to discuss options to pursue the bachelor's degree.
CHM 2045/L – General Chemistry I/Lab (Physical Science core) (4 cr)	Continue collecting artifacts from courses for your Academic & Career Portfolio in SLS 2370

**TOTAL SEMESTER CREDIT HOURS: 8** 

SEMESTER 5	ACTION ITEMS
MAC 2312 – Calculus II <sup>iv</sup> (Elective Prerequisite) (4 cr)	<ul> <li>Meet with your advisor to confirm academic and career goals by the end of the semester.</li> <li>Meet with a career advisor/coach to research your career options.</li> <li>Continue collecting artifacts from your courses for your Academic &amp; Career Portfolio in SLS 2370.</li> </ul>
PHY 2048C – General Physics with Calculus I (Elective Prerequisite) (5 cr)	Begin applying for Financial Aid and Scholarships     You can start the FAFSA in October for the next academic year. (i.e., in October 2024, you can complete the FAFSA for if you plan to register for classes at a college or university Fall 2025)
	ER CREDIT HOURS: 9
SEMESTER 6	ACTION ITEMS
Choose one: SPC 2608 – Public Speaking OR SPC 1017 – Oral Communications OR SPC 1061 – Introduction to Academic and Professional Speaking <sup>iv</sup> (Communications)	Meet with your advisor to confirm or update your academic/career pathway and program of study.
SLS 2370 – Personal Academic & Career Engagement iv (3rd Soc Sci)	
	ER CREDIT HOURS: 6
TOTAL SEMESTI SEMESTER 7	ACTION ITEMS
	<ul> <li>ACTION ITEMS</li> <li>Begin applying to your top choice universities.</li> <li>Begin applying for Financial Aid and Scholarships         <ul> <li>You can start the FAFSA in October for the next academic year. (i.e., in October 2024, you can complete the FAFSA for</li> </ul> </li> </ul>
SEMESTER 7  Choose one: LIT 2000 – Introduction to Literature OR Any general education AML, ENL, LIT, PHI or REL courses	<ul> <li>ACTION ITEMS</li> <li>Begin applying to your top choice universities.</li> <li>Begin applying for Financial Aid and Scholarships         <ul> <li>You can start the FAFSA in October for the next academic year. (i.e., in October 2024, you can complete the FAFSA for if you plan to register for classes at a college or university Fall 2025)</li> </ul> </li> </ul>
SEMESTER 7  Choose one: LIT 2000 – Introduction to Literature OR Any general education AML, ENL, LIT, PHI or REL courses (Humanities) iv  PHY 2049C – General Physics with Calculus II (Elective Prerequisite) (5 cr)	<ul> <li>ACTION ITEMS</li> <li>Begin applying to your top choice universities.</li> <li>Begin applying for Financial Aid and Scholarships         <ul> <li>You can start the FAFSA in October for the next academic year. (i.e., in October 2024, you can complete the FAFSA for if you plan to register for classes at a college or university</li> </ul> </li> </ul>
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SEMESTER 7  Choose one: LIT 2000 – Introduction to Literature OR Any general education AML, ENL, LIT, PHI or REL courses (Humanities) iv  PHY 2049C – General Physics with Calculus II (Elective Prerequisite) (5 cr)  TOTAL SEMESTI  SEMESTER 8  Choose one: PSY 2012 – General Psychology OR SYG 1000 – Introduction to Sociology OR SYG 2300 – Introduction to Social Psychology OR	ACTION ITEMS  • Begin applying to your top choice universities. • Begin applying for Financial Aid and Scholarships • You can start the FAFSA in October for the next academic year. (i.e., in October 2024, you can complete the FAFSA for if you plan to register for classes at a college or university Fall 2025) • Check with your advisor for important deadlines and dates  CREDIT HOURS: 8  ACTION ITEMS  • After reviewing your final program of study, apply for Graduation. • Meet with your advisor to apply for your degree.
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#### AAAE DEGREE MINIMUM: 60 SEMESTER CREDIT HOURS PATHWAY TOTAL: 65-66<sup>vi</sup> CREDIT HOURS

Degree plans may change in later catalogs. You may use this pathway if you entered the college on or before this date.

I Students must earn at least 25% of the credit hours (15 hours) required for graduation through instruction by FGC to award the degree.

II This is not an official degree plan. For official degree requirements, click here.

IV You must earn a grade of "C" or better in all Gordon Rule classes.

V This course is only offered in the spring term.

 $<sup>^{</sup>m Vi}$  If student enrolls ready for MAC 1114/1140, then MAC 1105 is not necessary, bringing the Total Pathway credits to 62-63.