

Luminus BTEC Level 5 Higher National Diploma in Automotive Engineering

2024-2025 | Advisory Plan (starting 2023 intake)

[Program Specification](#)



YEAR 1	First Semester						Second Semester						Summer Semester					
	Unit Code	Unit Title	Credit Hrs.	Theory Hrs.	Prct. Hrs.	Fin. Crd.	Unit Code	Unit Title	Credit Hrs.	Theory Hrs.	Prct. Hrs.	Fin. Crd.	Unit Code	Unit Title	Credit Hrs.	Theory Hrs.	Prct. Hrs.	Fin. Crd.
		English Language Level 1	3	4	2	3		English Language Level 2	3	4	2	3		Optional Unit 2: Level 4	4	2	2	3
	CSD-01	Study Skills	3	3	0	3	CSD-02	Career Readiness	3	3	0	3	5006	Further Engineering Mathematics	4	2	2	3
	4063	Engineering Mechanics and Materials	4	2	2	3		Optional Unit 1: Level 4	4	2	2	3						
	4002	Engineering Mathematics	4	2	2	3	4091	Automotive Fundamentals	4	2	2	3						
	4003	Engineering Science I	4	2	2	3	4092	Vehicle Dynamics and Performance	4	2	2	3						
	Total		18	13	8	15	Total		18	13	8	15	Total		8	13	8	6

YEAR 2	First Semester						Second Semester						Summer Semester					
	Unit Code	Unit Title	Credit Hrs.	Theory Hrs.	Prct. Hrs.	Fin. Crd.	Unit Code	Unit Title	Credit Hrs.	Theory Hrs.	Prct. Hrs.	Fin. Crd.	Unit Code	Unit Title	Credit Hrs.	Theory Hrs.	Prct. Hrs.	Fin. Crd.
		English Language Level 3	3	4	2	3		English Language Level 4	3	4	2	3	5041	Engineering Project	4	2	2	3
	CSD-03	Entrepreneurship	3	3	0	3	FT-AU-01	Field Training	3	0	9	3		Optional Unit 3: Level 5	4	2	2	3
	4062	Professional Engineering Practice (Pearson-set) *	4	2	2	3	5002	Professional Engineering Management (Pearson-set) *	4	2	2	3						
	5059	Automotive Aerodynamics	4	2	2	3		Optional Unit 1: Level 5	4	2	2	3						
	5058	Automotive Structures and Materials	4	2	2	3		Optional Unit 2: Level 5	4	2	2	3						
	Total		18	13	8	15	Total		18	10	17	15	Total		8	4	4	6

* Pearson-Set units for both Level 4 and Level 5 must be studied in the same academic year to ensure that the same THEME is applied.

Luminus BTEC Level 5 Higher National Diploma in Automotive Engineering



2024-2025 | Study Plan (starting 2023 intake)

Year 1	Luminus BTEC Level 4 Higher National Certificate (HNC) in Automotive Engineering					
	Unit Code	Unit Name	Credit Hours	Theory Hours	Practical Hours	Pearson Level
4 Units: Core - Mandatory						
	4063	Engineering Mechanics and Materials	4	2	2	level 4
	4002	Engineering Mathematics	4	2	2	level 4
	4003	Engineering Science I	4	2	2	level 4
	4062	Professional Engineering Practice (Pearson-set)	4	2	2	level 4
2 Units: Specialist - Mandatory						
	4091	Automotive Fundamentals	4	2	2	level 4
	4092	Vehicle Dynamics and Performance	4	2	2	level 4
2 Units: Optional (selected from the list below)						
	4111	Powertrain and Hybrid Vehicles	4	2	2	level 4
	4112	Vehicle Repair and Diagnostics	4	2	2	level 4
	4011	Fluid Mechanics	4	2	2	level 4
	4013	Fundamentals of Thermodynamics and Heat Transfer	4	2	2	level 4
	4115	Vehicle Electrical and Electronics	4	2	2	level 4
	4061	Programming for Engineers	4	2	2	level 4
2 Units: College Requirements - Mandatory						
	CSD-01	Study Skills	3	3	0	
	CSD-02	Career Readiness	3	3	0	
2 Units: English Language Levels - Mandatory						
		English Language Level 1	3	4	2	
		English Language Level 2	3	4	2	

Year 2	Luminus BTEC Level 5 Higher National Diploma (HND) in Automotive Engineering					
	Unit Code	Unit Name	Credit Hours	Theory Hours	Practical Hours	Pearson Level
2 Units: Core - Mandatory						
	5041	Engineering Project	4	2	2	level 5
	5002	Professional Engineering Management (Pearson-set)	4	2	2	level 5
3 Units: Specialist - Mandatory						
	5006	Further Engineering Mathematics	4	2	2	level 5
	5058	Automotive Structures and Materials	4	2	2	level 5
	5059	Automotive Aerodynamics	4	2	2	level 5
3 Units: Optional (selected from the list below)						
	5063	Further Hybrid and Electric Vehicle Technologies	4	2	2	level 5
	5067	Vehicle Operations	4	2	2	level 5
	5069	Vehicle Systems and Technology	4	2	2	level 5
	5005	Further Thermodynamics	4	2	2	level 5
	5048	Sensors and Automation	4	2	2	level 5
			4	2	2	level 5
2 Units: College Requirements - Mandatory						
	CSD-03	Entrepreneurship	3	3	0	
	FT-AU-01	Field Training	3	0	9	
2 Units: English Language Levels - Mandatory						
		English Language Level 3	3	4	2	
		English Language Level 4	3	4	2	

Pre-A1-ID	Foundation English
A1-ID	Elementary English
A2-ID	Pre-Intermediate English
B1-ID	Intermediate English
B2-ID	Upper Intermediate English
C1-ID	Advanced English
C2-ID	Proficiency (English)

For English Language Levels, learners attend 2 levels each year.
Starting level (for English Language Level 1) is decided based on a placement test.
Learners will then progress to the next level respectively until they complete 4 levels in total.