

Australian Qualifications Framework

The Australian Qualifications Framework (AQF) is a single national, comprehensive system of qualifications offered by higher education institutions (including universities), vocational education and training institutions and secondary schools. Each AQF qualification has a set of descriptors which define the type and complexity of knowledge, skills and application of knowledge and skills that a graduate who has been awarded that qualification has attained, and the typical volume of learning associated with that qualification type.

This program is at AQF Qualification Level 09. Graduates at this level will have specialised knowledge and skills for research, and/or professional practice and/or further learning.

The full set of levels criteria and qualification type descriptors can be found by visiting www.aqf.edu.au.

Admission requirements

To be eligible for admission, applicants must satisfy the following requirements:

- Completion of an Australian university three or four year Bachelor degree in the area of engineering in the relevant cognate specialisation (major), or equivalent.
Or
Completion of an appropriate four year Bachelor degree in the area of engineering in a non-cognate specialisation (major field), or equivalent.
- English Language Proficiency requirements for Category 3.

The standing of degrees awarded by an overseas institution will be determined by reference to the Sydney Accord, of which Engineers Australia (EA) is a signatory, and the federal government agency, International Education group, an agency of the Department of Education and Training.

All students are required to satisfy the applicable [English language requirements](#).

If students do not meet the English language requirements they may apply to study a University-approved [English language program](#). On successful completion of the English language program, students may be admitted to an award program.

Program fees

Commonwealth supported place

A Commonwealth supported place is where the Australian Government makes a contribution towards the cost of a students' higher education and students pay a [student contribution amount](#), which varies depending on the courses undertaken. Students are able to calculate the fees for a particular course via the [Course Fee Finder](#).

Commonwealth Supported students may be eligible to defer their fees through a Government loan called [HECS-HELP](#).

Domestic full fee paying place

Domestic full fee paying places are funded entirely through the full fees paid by the student. Full fees vary depending on the courses that are taken. Students are able to calculate the fees for a particular course via the [Course Fee Finder](#).

Domestic full fee paying students may be eligible to defer their fees through a Government loan called [FEE-HELP](#) provided the

International full fee paying place

International students pay full fees. Full fees vary depending on the courses that are taken and whether they are studied on-campus, via distance education/online. Students are able to calculate the fees for a particular course via the [Course Fee Finder](#).

Program structure

The Master of Engineering Science comprises 16 units (14 single-unit academic courses and one two-unit academic course) and five zero-unit practice courses. The structure is shown below:

Schedule A: Seven core courses (eight units)

Schedule B: A six-course specialisation (six units)

Schedule C: Two approved courses (two units)

Schedule D: From two to five Practice Courses (zero units), depending upon specialisations.

Required time limits

Students have a maximum of 6 years to complete this program.

Specialisation

The specialisation study provides students with knowledge and skills in a specific discipline. The specialisation study areas in the Master of Engineering Science are:

- Agricultural Engineering
- Civil Engineering
- Electrical and Electronic Engineering
- Environmental Engineering
- Mechanical Engineering
- Power Engineering
- Structural Engineering
- Engineering Management and Enterprise

IT requirements

Access to an up-to-date computer is necessary. On-campus students can access appropriately equipped laboratories, but should consider acquisition of their own computer. External students should be able to access a computer with the following [minimum standards](#) as advised by the Uni

External students must attend a number of [residential schools](#) during their program to obtain experience in practical and professional activities appropriate to the program. The residential schools are included in Practice courses which are conducted in Semester 3 or during the recess periods. The dates for each residential school Practice course are shown in the [Residential School schedule](#) in this Handbook and external students should ensure they are able to attend the residential school prior to enrolling in a Practice course. Personal protective equipment is compulsory in many engineering, construction and spatial science laboratories, students should confirm the requirements before attending residential schools for Practice courses.

Students who enrol in on-campus mode for Practice courses normally undertake a series of weekly activities and/or attend a compulsory residential school.

Agricultural Engineering

- [ENG3902 Professional Practice 1](#)
- [ENG4903 Professional Practice 2](#)
- [AGR3903 Soil and Water Engineering Practice 2](#)
- [AGR3905 Agricultural Engineering Practice](#)

Civil Engineering

- [ENG3902 Professional Practice 1](#)
- [ENG4903 Professional Practice 2](#)
- [CIV3907 Civil Systems Practice](#)
- [CIV4908 Civil Design Practice](#)

Electrical and Electronic Engineering

- [ENG3902 Professional Practice 1](#)
- [ENG4903 Professional Practice 2](#)

Any two of the following:

- [ELE2912 Electrical and Electronic Practice B](#)
- [ELE3914 Electrical and Electronic Practice D](#)
- [ELE3915 Electrical and Electronic Practice E](#)

Environment Engineering

- [ENG3902 Professional Practice 1](#)
- [ENG4903 Professional Practice 2](#)
- [ENV3904 Environmental Engineering Practice](#)
- [AGR3903 Soil and Water Engineering Practice 2](#)

Mechanical Engineering

- [ENG3902 Professional Practice 1](#)
- [ENG4903 Professional Practice 2](#)

Any two of the following:

- [MEC3903 Mechanical Practice 3](#)
- [MEC3904 Mechanical Practice 4](#)
- [MEC3905 Mechatronic Practice](#)

Power Engineering

- [ENG3902 Professional Practice 1](#)
- [ENG4903 Professional Practice 2](#)

Any two of the following:

- [ELE2912 Electrical and Electronic Practice B](#)

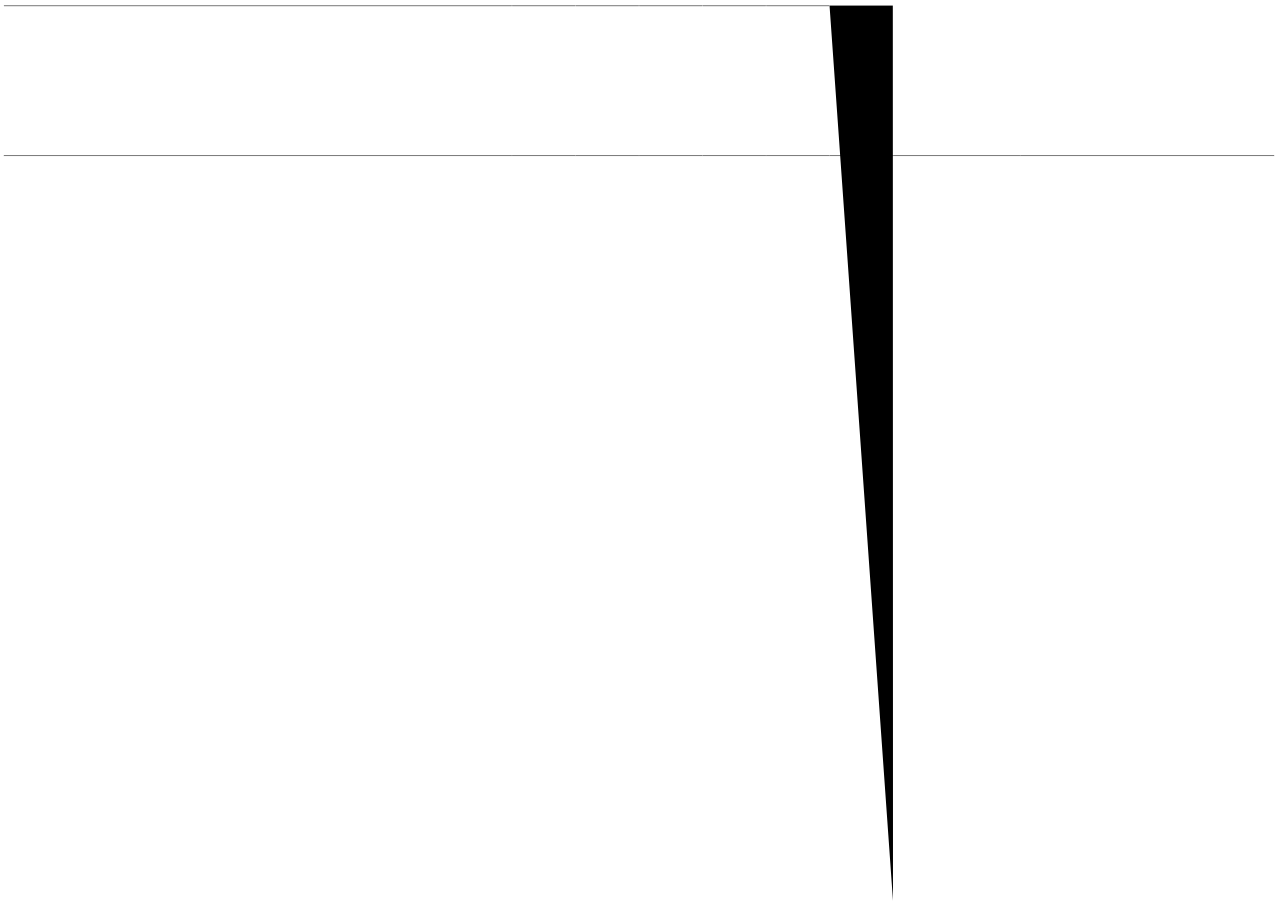
- ELE3914 Electrical and Electronic Practice D
- ELE3915 Electrical and Electronic Practice E

Structural Engineering

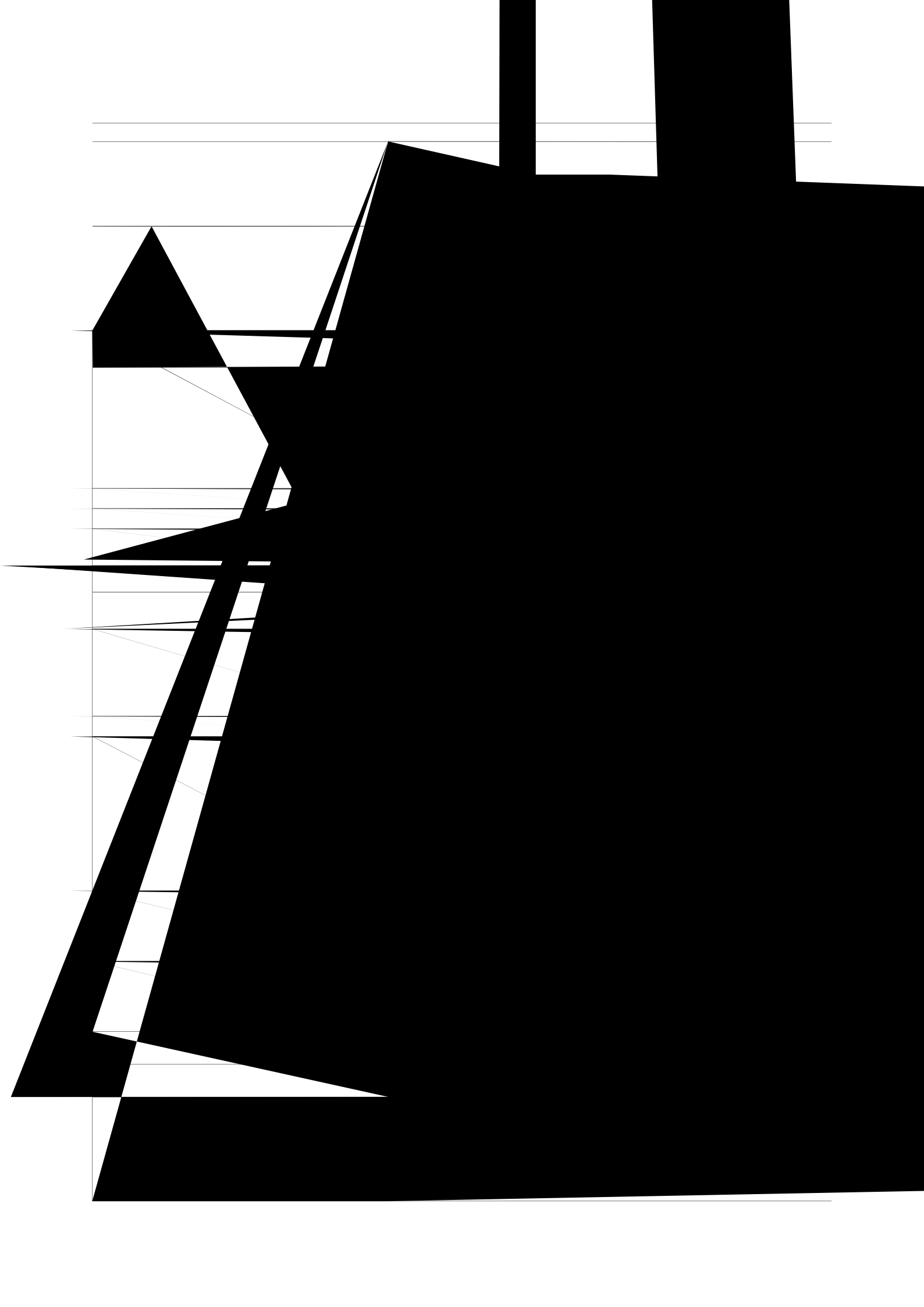
- ENG3902 Professional Practice 1
- ENG4903 Professional Practice 2
- CIV3907 Civil Systems Practice
- CIV4908 Civil Design Practice

Agricultural Engineering specialisation recommended enrolment pattern

Students are able to enrol in any offered mode of a course (on-campus, external or online), regardless of the program mode of study they enrolled in.



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Specialisation: Mechanical Engineering (Specialisation Study Code: 16220)								
Course	Year of program and semester in which course is normally studied						Residential school	Enrolment requirements
	On-campus (ONC)		External (EXT)		Online (ONL)			
	Year	Sem	Year	Sem	Year	Sem		
BKD16-0 MoIcbppfIk^i Mo^`qf`b /	/	.	1	/			J	Mob*obnrfrpfqb7 BKD06- / ^ka Pqrabkqp j rpg_b bkoIiiba fk Ikb Ic qeb cliiI t fkd MoI do^ j p7 ?@KE lo ?@LK lo ?B?? lo ?B?@ lo ?BE? lo ?BEF lo ?BEP lo ?BKD lo ?BKE lo JBKP+Pqrabkqp ^kkIqbkoli fk BKD06- / ^ka BKD16-0 fk qeb p^ j b pb j bpbob+
BKD16-6 T Ioh Bumbobk`b * MoIcbppfIk^i						1	.)/0	
And two from the list below:								
JB@06-0 Jb`e^kf`^i Mo^`qf`b 0	.	/	0	0			J	
JB@06-1 Jb`e^kf`^i Mo^`qf`b 1	/	/	1	/			J	Mob*obnrfrpfqb7 JB@0.- / lo JB@/. -3 lo Pqrabkqp j rpg_b bkoIiiba fk Ikb Ic qeb cliiI t fkd MoI do^ j p7 DAKP lo JBKP lo JBMO
JB@06-2 Jb`e^qoIkf` Mo^`qf`b			1	/			J	

Footnotes

- # Students wishing to undertake a research project with a total of six units may enrol in [ENG8414](#) in lieu of [ENG8412](#) in Schedule A and two approved courses from Schedule C. Approval from the Faculty of Health, Engineering and Sciences is required to undertake a six unit research project prior to enrolling in [ENG8414](#).
- ~ Level 8 courses from other areas of study may be chosen as approved courses with the approval of the Faculty of Health, Engineering and Sciences.
- * Unavailable in on-campus mode in 2021
- ** [MEC4108 Advanced Thermofluids](#) will be offered for the first time in 2021. Students can enrol in [MEC4103 Heat Transfer](#) instead of [MEC4108 Advanced Thermofluids](#) only if they also complete [MEC3102 Fluid Mechanics](#) instead of [MEC3107 Thermofluids](#).
- ^ Offered odd years only.

Power Engineering specialisation recommended enrolment pattern

Students are able to enrol in any offered mode of a course (on-campus, external or online), regardless of the program mode of study they enrolled in.

Specialisation: Power Engineering (Specialisation Study Code: 16221)								
Course	Year of program and semester in which course is normally studied						Residential school	Enrolment requirements
	On-campus (ONC)		External (EXT)		Online (ONL)			
	Year	Sem	Year	Sem	Year	Sem		
Schedule A: Core Courses Students must complete all seven courses listed in this schedule.								
BKD2-- MoIcbppfIk^i Phfiip fk Bkdfkbbfokd	.	.)0				.	.)/0	
BKJ/3-- >as^k`ba Bkdfkbbfokd J^qeb j ^qf`p)0	Mob*obnrfrpfqb7 BKJ.3-- lo Pqrabkqp j rpg_b bkoIiiba fk Ikb Ic qeb cliiI t fkd MoI do^ j p7 D@BK lo JBQ@ lo JBKP lo DAKP lo JBMO lo JP@K
BKD5/ -5 >as^k`ba Bkdfkbbfokd MoIqb`q J^k^db j bkq	.	.				/	.	
BKD0.-1 Bkdfkbbfokd Pfj ri^qfIk p ^ka @I j mrq^qfIk p	.	/				.	/	Mob*obnrfrpfqb7 BKJ/3-- lo J>Q/... lo J>Q/2--& lo Pqrabkqp j rpg_b bkoIiiba fk Ikb Ic qeb cliiI t fkd MoI do^ j p7 DABQ lo JBQ@ lo DAKP lo JBKP
BKD5-- Bkdfkbbfokd Obpb^`e Jbqelap	.	/)0				0	.)/	

Specialisation: Structural Engineering (Specialisation Study Code: 16222)								
Course	Year of program and semester in which course is normally studied						Residential school	Enrolment requirements
	On-campus (ONC)		External (EXT)		Online (ONL)			
	Year	Sem	Year	Sem	Year	Sem		
							il t fkd Mol do^ j p7 D@BK lo MD@K lo JBQ@ lo JBMO lo D@KP lo DAKP lo JBKP lo JBK@ lo J>BK	
Schedule C: Approved Courses Students must complete two of the courses listed in this schedule. ~								
@FS55- . @Iab*?^pba Pqor`qro^i Abpfdk						.		
@FS55-1 >as^k`ba Abpfdk Mo^`qf`b rpfkd Ckftqb Bib j bkq >k^ivpfp						/		
BKD5. . . Qb`ekliidf`^i Fj m^`q ^ka fup J^k^db j bkq		.				.		
BKD5. -0 J^k^db j bkq lc Qb`ekliidf`^i Ofph		/				/		
BKD5. -1 >ppbq J^k^db j bkq fk ^k Bkdfkbbofkd BksfoIk j bkq		.				.		
BKD5/ -2 Molqb`q J^k^db j bkq Mo^`qf`b`		/				/		
BKD5/ -4 FkkIs^qfIk J^k^db j bkq ^ka Kbt Mol ar`q Absbil m j bkq						0		
JB@0/ -0 J^qbof`ip Qb`ekliidv		.				.	Mob*obnr rfpqb7 JB@. /-. lo Pqrabkq j rpa_b bkoIiba fk lkb lc qeb cliil t fkd Mol do^ j p7 D@BK lo JBQ@ lo D@KP lo DAKP lo JBMO lo JBKP	
Schedule D: Practice Courses Students must complete the following five practice courses.								
BKD06- / MolcbppfIk^i Mo^`qf`b .			0	/			J Mob*obnr rfpqb7 Pqrabkq j rpa_b bkoIiba fk lkb lc qeb cliil t fkd Mol do^ j p7 ?@KE lo ?@LK lo ?B?? lo ?B?@ lo ?BE? lo ?BEF lo ?BEP lo ?BKD lo ?BKE lo JBKP	
BKD16-0 MolcbppfIk^i Mo^`qf`b /	/	.	1	/			J Mob*obnr rfpqb7 BKD06- / ^ka Pqrabkq j rpa_b bkoIiba fk lkb lc qeb cliil t fkd Mol do^ j p7 ?@KE lo ?@LK lo ?B?? lo ?B?@ lo ?BE? lo ?BEF lo ?BEP lo ?BKD lo ?BKE lo JBKP+ Pqrabkq ^`kklq bkoIiba fk BKD06- / ^ka BKD16-0 fk qeb p^ j b pb j bpqbo*	
BKD16-6 T lch Bumbofkb`b * MolcbppfIk^i					1	.)/0		
@FS06-4 @fsfi Pvpqb j p Mo^`qf`b`			.	0			J Mob*obnr rfpqb7 @FS/2-0 lo Pqrabkq j rpa_b bkoIiba fk lkb lc qeb cliil t fkd Mol do^ j p7 JBKP lo JBMO	
@FS16-5 @fsfi Abpfdk Mo^`qf`b`			/	.)/			J @I*obnr rfpqb7 @FS12-5 lo Pqrabkq j rpa_b bkoIiba fk qeb cliil t fkd Mol do^ j 7 JBMO lo JBKP	

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