

LOCOMOTIVE AND AIR-BRAKE COURSES

(See paragraph concerning Prerequisites before making selections)

Serial No.	SUBJECTS (For contents of papers, see synopses of subjects under Locomotive and Air-Brake Courses, pages 315-320)	Brake Equipment for High-Speed Trains	Locomotive Engineer's	Diesel Locomotive	Locomotive Firemen's	Railway Conductor's	Air Brake	Locomotive Brake Equipment	Locomotive Machinist	Locomotive Engineer's Mechanical	Car Inspector and Air Brake	Universal Control Valve
		[RBZ]	[RBB]	[RDL]	[RBC]	[RBF]	[RBE]	[RBI]	[RBL]	[RAO]	[RAS]	[RBY]
1967A-B	Locomotive Boilers, 2 lessons.											
5804	Locomotive Lubricators.											
2504	Heat and Superheaters.											
2501	Locomotive Management. Contained in Form 1087§.											
2510	Locomotive Breakdowns											
2355	Type C-2 Locomotive Booster.											
5370	Baker Locomotive Valve Gear.		*									
1299	Oil-Burning Locomotives.											
5550A-B	Train Rules, 2 lessons.			*								
9525	Principles of Air Conditioning.											
5458-63	Air Conditioning of Railway Cars, 6 lessons (for reference only).											
2239	Elements of Blueprint Reading.											
1957	Air-Brake Compressors. Included in Form 102C§.		*									
2508	Automatic Train Control. Accompanied by Form 2508X§.			*								
2511	A-1 Engine Equipment. In Form 102C§.											
2513	Air-Brake Troubles.							*				
2071A-B	Foundation Brake Rigging, 2 lessons.											
879	Air-Signal System.											
5548A-B	No. 6 ET Locomotive Brake Equipment, 2 lessons. In Form 102C§.											
5642A-B	No. 8 ET Locomotive Brake Equipment, 2 lessons. In Form 102C§.			**								
5702A-B	No. 8 EL Diesel Freight-Locomotive Brake Equipment, 2 lessons (in preparation). In Form 5702X											
5464	Brake Equipment for High Speed Trains with Form 5464A											
3233	Type K Freight Car Brake Equipment.											
2518	Type AB Freight Brake Equipment.											
4004	UC Passenger Car Brake Equipment, with Charts. In Form 104§.											
1964	PM and LN Passenger Brake Equipment.		*									
4001	Locomotive Valve Setting		*									
2516A-B	The Steam Locomotive, 2 lessons											
1969	Locomotive Valves, Accompanied by Form 56§.											
1968	Stephenson Valve Gear.											
4003A-B	Walschaert Valve Gear, 2 lessons									*		
4000	Type D Duplex Stoker.		*					**		**		
5547	Locomotive Stokers		*					**		**		
5236	Locomotive Injectors.		*					**		**		

2517	Locomotive Feedwater Heating Equipment											
5629	Lathes											
5530	Lathe Tools.											
5576	Lathe Thread Cutting.											
2222	Shaper and Slotter Work.											
2212	Planers.											
2214	Planer Practice.		*					*				
1537	I.T. Automatic Control Equipment.											
2350A-C	Railway Car-Lighting, 3 lessons											
5504	Car Heating.											
3234	Yard Inspection of Trains.		†									
5549	Locomotive Headlights.											
1975-81	Arithmetic, 7 lessons.		†									
2072	Westinghouse Air Brake											
	U.S. Safety Appliances for All Classes of Cars and Locomotives (for reference only).											
	Code of Rules for Interchange of Traffic (no lesson)											
	Wheel and Axle Manual (for reference only)											
1958A-B	Spelling, 8 lessons.					*						
1986A-B	Commercial Calculations, 2 lessons											
1960	Air-Brake Models (2) (no lesson). In Form 102C§.											
5620A-B	Hand Firing of Locomotives.		*									
2073	Locomotive Appliances, 2 lessons											
2354	Southern Locomotive Valve Gear.											
2357	Laying Off Shoes and Wedges.											
2359	Laying Off Locomotive Frames.											
2500	Machine Frame Cross-Ties.											
2502	Locomotive Cylinder and Erecting Work.											
2507	Cylinder, Guide, and Crosshead Repair Work.											
2508	Locomotive Rod, Wheel, and Pin Work.											
5710	Locomotive Steam Pipe and Spring Work.											
5711	Principles of Diesel Engines.											
5685	Fundamental Electricity.											
5687	Diesel-Electric Locomotives.											
5690A-B	Diesel Locomotive Trucks and Draft Rigging.											
5686A	Two-Cycle Diesel Locomotive Engines, 2 lessons.											
5689A-B	Four-Cycle Diesel Locomotive Engines, Part 1.											
5684A-D	Diesel Locomotive Auxiliaries, 2 lessons (in preparation).											
5717	Electrical Equipment of Diesel Locomotives, 4 lessons.											
5718	Operation of Diesel Switching Locomotives (in preparation).											
5719	Operation of Diesel Freight Locomotives (in preparation).											
	Operation of Diesel Passenger Locomotives (in preparation).											
	Number of lessons including final examination.	1	48	25	20	32	25	12	35	28	21	1
	Estimated average study time, hours (see page 1).	16	725	380	300	500	360	170	540	440	330	16

* Optional. † (1975-6-7-9) 4 lessons optional. ‡ (1975-6-7-8) 4 lessons optional. †† (1975-6-7-8-9) 5 lessons optional.
 ** Optional; in Form No. 8 ET. § For Contents of Forms, see pages 106-107.