

OREGON-WASHINGTON RAILROAD & NAVIGATION Co.



18 FIRST DIVISION EMPLOYEES' TIME TABLE

To Take Effect Saturday, May 8, 1915

12:01 A. M. "Pacific Time."

For the Government and Information of Employees only, and not intended for the use of the public.
The Company reserves the right to vary from this Time Table at pleasure.

J. P. O'BRIEN,
Vice President and General Manager.



M. J. BUCKLEY,
General Superintendent.

OREGON-WASHINGTON RAILROAD & NAVIGATION CO.

CONDENSED TIME TABLE—Huntington-Portland

WESTWARD.							DISTANCE FROM PORTLAND	EASTWARD.													
Second Class				First Class				First Class				Second Class									
				255	17	1		19	11	5		6	2	18	12	4	256				
				Fast Freight	Ore. & Wash. Limited	Portland Local	Portland & Puget Sound Express	Spokane, Portland Passenger	Fast Mail		Salt Lake Express	Pendleton Local	Ore. & Wash. Limited	Spokane, Portland Passenger	Portland & Puget Sound Express	Fast Freight					
				Daily.	Daily.	Daily.	Daily.	Daily.	Daily.		Daily.	Daily.	Daily.	Daily.	Daily.	Daily.					
				A M L 5.10	A M L 4.50		P M L 7.35		P M L 6.15	398.8	HUNTINGTON	0.0	P M A 3.45		A M A 12.35		A M A 9.55	P M A 1.30			
				P M 3.30	9.00		A M 12.05		9.40	299.4	LA GRANDE	99.4	11.35		8.30		5.45	3.45 A M			
				11.00	11.55	A M L 8.35	3.15		A M 12.10	225.1	PENDLETON	173.7	7.30	P M A 5.00	5.15		2.35	6.00			
				A M 3.00	P M 1.20	10.15	5.15	A M L 2.20	1.40	183.3	UMATILLA	215.5	5.45	3.15 P M	3.50	P M A 11.50	1.05 A M	2.15 P M			
				11.00	4.10	P M 2.00	8.45	5.00	4.20	84.4	THE DALLES	314.4	2.40	11.25	12.45 P M	9.00	10.05	4.00 A M			
					7.00 P M A	5.30 P M A	12.15 P M A	7.45 A M A	7.00 A M A	0.0	PORTLAND	398.8	12.01 A M L	7.50 A M L	10.00 A M L	6.30 P M L	7.00 P M L				
				6.20 P M A							ALBINA						10.00 P M L				
				87.10	14.10	8.55	16.40	5 25	12.45		Through Time		15.45	9.10	14.35	5.20	14.55	39.30			

Figures shown on this page for information only.

FIRST DISTRICT—Umatilla and The Dalles.

WESTWARD.											EASTWARD.																										
Length of passing trains in this direction.	Second Class.				First Class.						DISTANCES FROM PORTLAND	First Class.						Second Class.																			
	23		255		35		17		1			19		11		5		6		2		18		12		4		36			256		24				
	Way Freight		Fast Freight		Bend The Dalles Passenger		Oregon and Washington Limited		Portland Local			Portland and Puget Sound Express		Spokane Portland Passenger		Fast Mail		Salt Lake Express		Pendleton Local		Oregon and Washington Limited		Portland Spokane Passenger		Portland and Puget Sound Express		The Dalles Bend Passenger			Eastern Fast Freight		Way Freight				
WFTY	AM	L	AM	L	PM	L	AM	L	AM	L	AM	L	AM	L	AM	L	AM	A	PM	A	PM	A	PM	A	AM	A	PM	A	PM	A	PM	A					
	7.00		3.00		1.20		10.15		5.15		2.20		1.40	183.3	DNR	UMATILLA	A 183	5.40		3.10		3.45		11.45													
8110	7.20		3.15		1.26		10.21		5.30		2.25		1.45	179.1		BAILEY	A 179	5.30	f	3.00		3.35		11.35													
3200	7.40		3.30		1.32		10.27		5.37		2.31		1.51	175.9	D	IRRIGON	A 176	5.22	s	2.53		3.28		11.29													
8200	8.00		3.45		1.38		10.34		5.45		2.37		1.57	172.2		JUDSON	A 172	5.15	f	2.45		3.21		11.22													
8200 W	8.30		4.05		1.47		10.44		5.54		2.46		2.06	166.7		COYOTE	A 167	5.06	f	2.35		3.12		11.14													
8118 P	8.55		4.25		1.55		10.52		6.03		2.52		2.12	162.2		PETERS	A 162	4.59	f	2.28		3.04		11.07													
8260 P	9.15		4.51		2.01		10.59		6.09		2.58		2.20	158.4		CASTLE ROCK	A 158	4.51	f	2.20		2.58		11.00													
8110 P	9.45		5.15		2.10		11.09		6.20		3.07		2.29	152.6		BOULDER	A 153	4.44		2.10		2.48		10.50													
	10.05		5.30		2.18		11.16		6.26		3.13		2.35	148.5	D	HEPPNER JCT.	A 149	4.37	s	1.55		2.41		10.43													
8043 WP	10.15		5.35		2.21		11.19		6.29		3.16		2.38	147.0		WILLOWS	A 147	4.34	f	1.42		2.38		10.40													
8015 P	10.35		5.50		2.30		11.27		6.37		3.23		2.45	142.6		SILICA	A 143	4.27		1.30		2.30		10.33													
7200 TFWP	11.00		6.05		2.37		11.35		6.45		3.30		2.52	138.0	DN	ARLINGTON	A 138	4.19	s	1.22		2.14		10.25													
8208 P	11.20		6.20		2.45		11.43		6.56		3.36		2.58	134.3		GILMORE	A 134	4.13		1.14		2.08		10.19													
4946 WP	11.52		6.40		2.52		11.52		7.06		3.43		3.05	129.8		BLALOCK	A 130	4.06	f	1.06		2.01		10.12													
8745 P	12.10		7.00		2.58		12.01		7.15		3.50		3.12	125.8		RAMSAY	A 126	4.00		12.59		1.54		10.06													
8217 P	12.20		7.20		3.01		12.05		7.20		3.54		3.15	123.4	D	QUINTON	A 123	3.54	f	12.55		1.50		10.03													
8000 P	12.47		7.40		3.08		12.12		7.28		4.01		3.23	119.1		SQUALLY HOOK	A 119	3.42	f	12.47		1.43		9.56													
8500 P	1.15		7.55		3.14		12.20		7.37		4.08		3.30	115.3		GOFF	A 115	3.30	f	12.40		1.37		9.50													
2775 WP	1.32		8.05		3.18		12.25		7.42		4.12		3.34	112.3		DAY	A 112	3.18	f	12.36		1.32		9.46													
8000 P	1.55		8.15		3.22		12.30		7.46		4.16		3.38	109.6		RUFUS	A 110	3.15	s	12.30		1.28		9.43													
2720 P	2.10		8.25		3.26		12.35		7.52		4.20		3.42	107.0		GRANT	A 107	3.11	f	12.18		1.24		9.39													
6954 Y	2.25		8.35		3.30		12.40		7.58		4.24		3.46	104.1	DN	BIGGS	A 104	3.07	s	12.06		1.20		9.35													
980 WYP	2.35		8.45		3.34		12.45		8.03		4.28		3.50	102.0	D	SHERMAN	A 102	3.04	s	12.01		1.16		9.32													
2750	2.40		8.50		3.36		12.48		8.06		4.30		3.52	100.5		MILLER	A 101	3.02	f	11.57		1.14		9.30													
2625	3.00		9.05		3.42		12.58		8.15		4.36		3.58	96.6		CELILLO	A 97	2.57	s	11.50		1.08		9.23													
8678	3.25		9.25		3.50		1.10		8.25		4.43		4.05	91.9		DUNE	A 92	2.52	f	11.40		1.00		9.15													
WFTOP	4.00		10.00		3.35		4.05		1.30		8.40		5.00	84.4	DNR	THE DALLES	A 84	2.40	AM L	11.25		12.45		9.00													
	Daily		Daily		Daily		Daily		Daily		Daily		Daily					Daily		Daily		Daily		Daily													
	9.00		7.00		.35		2.45		3.15		8.25		2.40					8.00		8.45		8.00		2.45		2.55		.35									
	11.0		14.0		33.0		35.9		30.4		29.0		35.2					38.0		26.1		38.0		35.9		34.1		38.0									

Westward Trains are superior to Trains of the same class in the opposite direction.—See Rule 72.

- Trains 1 and 2 will stop on flag at Seufert, Big Eddy and Dillon.
- Train 4 will stop on flag at Big Eddy and Dillon.
- Train 11 will stop at any station to let off passengers from Third and Fourth Divisions.
- Train 19 will stop at any station to let off passengers from Third and Fourth Divisions and East of Pendleton.
- Train 18 will stop at any point between Biggs and Pendleton to let off passengers from Bend Branch.
- Train 35 will stop on flag at Celillo to let off passengers from Bend Branch.
- Train 17 will stop at any station to let off passengers from Cheyenne, Denver or East.

LOCATION OF COMMERCIAL SPURS

Seufert.....	M. P. 87.9
Tumwater.....	" 96.1

FIRST DISTRICT—Portland and North Portland Jct.
SECOND DISTRICT—Tidewater and Seattle

WESTWARD.

Second Class					First Class.										DISTANCE FROM PORTLAND	Time Table No. 18 May 8, 1915		STATION NUMBERS
Length of Passing Tracks in Cars	255	23	977	691												STATIONS		
	Fast Freight	Way Freight	Way Freight	Fast Freight	563	135	133	127	569	125	511	123	121	DR SEATTLE				
	Daily	Daily	Daily Ex. Mon.	Daily	Owl	C. M. & St. P. 15	C. M. & St. P. 18	C. M. & St. P. 17	Portland Express	C. M. & St. P. 16	Shasta Limited	C. M. & St. P. 46	C. M. & St. P. 115	DR SEATTLE 3.3				
PL															183.4	D 183		
IWFTYP				PM L 7.00										DNR ARGO 0.5	180.1	D 180		
				7.02										GEORGETOWN 5.6	179.6	D 179		
80 IP				7.20 PM A										DNR BLACK RIVER	173.9	D 174		

BETWEEN TACOMA JCT. AND BLACK RIVER, TRAINS WILL BE GOVERNED BY TIME TABLE, RULES AND REGULATIONS OF CHICAGO, MILWAUKEE & ST. PAUL RY. CO.

				PM L 9.00											147.6	TACOMA JCT. 1.1	D 147
				9.10 PM A											146.5	TIDEWATER	D 146

BETWEEN VANCOUVER AND TIDEWATER, TRAINS WILL BE GOVERNED BY TIME TABLES, RULES AND REGULATIONS OF NORTHERN PACIFIC RY. CO.

BETWEEN NORTH PORTLAND JCT. AND VANCOUVER, TRAINS WILL BE GOVERNED BY TIME TABLE, RULES AND REGULATIONS OF SPOKANE, PORTLAND & SEATTLE RY. CO.

P	PM L	PM L	PM L	AM L												NORTH PORTLAND JCT.		
P	5.25	2.40	2.02	6.30												6.8	1.2	D 7
P				6.40												5.6	PENINSULA JCT. 1.5	AA 6
P	5.35	2.50	2.25	6.50												4.1	ST. JOHNS JCT. 2.5	AA 4
P	6.20 PM A	3.15 PM A	2.45 PM A	7.00 AM A												1.6	DNR ALBINA 1.0	AA 2
IP																0.6	EAST PORTLAND .6	A 1
					6.45 AM A											0.0	DNR PORTLAND	A 0
	Daily	Daily	Daily Ex. Mon.	Daily													183.4	
	.55	.35	.45	12.00													Time over District	
	4.3	6.8	7.0	15.0													Average Speed per Hour	

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**FIRST DISTRICT—Portland and North Portland Jct.
SECOND DISTRICT—Tidewater and Seattle**

EASTWARD.

DISTANCE FROM PORTLAND	STATIONS	STATION NUMBERS.	First Class.										Second Class.				Length of passing tracks in cars and location of water, fuel and turning stations.
			120	124	562	128	134	130	132	512	564	692	978	24	256		
			C. M. & St. P. 16	C. M. & St. P. 17	Tacoma Seattle Express	C. M. & St. P. 18	C. M. & St. P. 118	C. M. & St. P. 45	C. M. & St. P. 15	Shasta Limited	Owl	Fast Freight	Way Freight	Way Freight	Fast Freight		
			Daily.	Daily.	Daily.	Daily.	Daily.	Sat. and Sun. only	Daily.	Daily.	Daily.	Daily.	Daily Ex. Sun.	Daily.	Daily.		
183.4	DR SEATTLE 3.3	Double Track	D 183	AM A 10.00	AM A 10.25	PM A 3.15	PM A 7.15	PM A 7.25	PM A 7.30	PM A 8.00	PM A 8.10	AM A 6.15					PL
180.1	DNR ARGO 0.5		D 180	AM L 9.48	AM L 10.13	PM L 3.03	PM L 7.01	PM L 7.11	PM L 7.20	PM L 7.48	PM L 7.58	AM A 6.03					IWFTYP
179.6	GEORGETOWN 5.7		D 179			f 3.02						f 6.02					
173.9	DNR BLACK RIVER		D 174			PM L 2.50					PM L 7.45	AM L 5.50					IP 30

BETWEEN TACOMA JUNCTION AND BLACK RIVER, TRAINS WILL BE GOVERNED BY TIME TABLE, RULES AND REGULATIONS OF CHICAGO, MILWAUKEE & ST. PAUL RY. CO.

147.6	TACOMA JCT. 1.1	D 147		PM A 1.51					PM A 6.55	AM A 5.01							AM A 5.11
146.5	TIDEWATER	D 146		PM L 1.45					PM L 6.50	AM L 4.52							AM L 4.50

BETWEEN VANCOUVER AND TIDEWATER, TRAINS WILL BE GOVERNED BY TIME TABLES, RULES AND REGULATIONS OF NORTHERN PACIFIC RY. CO.

BETWEEN NORTH PORTLAND JCT. AND VANCOUVER, TRAINS WILL BE GOVERNED BY TIME TABLE, RULES AND REGULATIONS OF SPOKANE, PORTLAND & SEATTLE RY. CO.

6.8	NORTH PORTLAND JCT. 1.2	D 7		AM A 8.50					PM A 2.30	PM A 11.20							PM A 8.15	AM A 3.55	P		
5.6	PENINSULA JCT. 1.5	AA 6		8.47					2.27	11.17							7.58	3.35	AM A 7.25	PM A 10.15	P
4.1	ST. JOHNS JCT. 2.5	AA 4		8.43					2.22	11.13							7.45	3.20	7.15	10.10	P
1.6	DNR ALBINA 1.0	AA 2		f 8.35					2.15	f 11.05							7.30	3.00	7.00	10.00	P
0.6	EAST PORTLAND .6	A 1																			IP
0.0	PORTLAND	A 0		AM L 8.30					PM L 2.10	PM L 11.00											
183.4			Daily.	Daily.	Daily.	Daily.	Daily.	Sat. and Sun. Only	Daily.	Daily.	Daily.						Daily.	Daily Ex. Sun.	Daily.	Daily.	
Time over District			.12	.12	6.45	.14	.14	.10	.12	6.00	7.15						11.15	.55	.25	.15	
Average Speed per Hour			16.5	16.5	27.1	14.1	14.1	19.8	16.5	30.5	25.3						16.0	5.7	9.0	16.0	

Westward Trains are superior to Trains of the same class in the opposite direction.—See Rule 72.

SPECIAL INSTRUCTIONS

- No. 1. **Special Instructions supersedes "Rules and Regulations of the Transportation Department."**
- No. 2. **Movements in Yards.** All trains, yard engines, light engines, etc., must proceed under control in both directions between Portland and East Portland, East Portland and St. Johns Jct., Seattle and Georgetown, Tacoma Jct. and Tidewater, Helsing Jct. and Independence, South Montesano and Montesano, Cosmopolis and Aberdeen, and within yards at Albina, East Portland, North Portland Jct., Kenton, The Dalles, Des Chutes River Bridge, Biggs, Umatilla, South Junction and Tono, and at Sherman on branch only.
- Protection at Other Stations.** Where yard limit signs are not erected, the station (S) whistling posts will be considered the yard limits. Stations referred to are those shown on the face of time table schedule. Extra trains must approach such stations expecting to find main track occupied without flag protection, and should any collision occur, the responsibility will rest upon the extra train approaching the station. Trains occupying main track at such stations must protect against regular trains and will also be governed by rules in regard to meeting and right-of-track orders.
- The limits of Albina yard extend from East Portland to St. Johns Jct.
The limits of North Portland Jct. yard extend from east portal of tunnel to North Portland Jct.
The limits of Kenton yard extend from Peninsula Jct. to yard limit sign located about 500 feet west of P. R. L. & P. Ry. overhead crossing.
Yard limits extend from Seattle Passenger Station to one-quarter mile west of west switch of Georgetown siding.
Yard limits extend from Tacoma Junction to Northern Pacific crossing at Tidewater.
Yard limits extend from C. M. & St. P. switch Helsing Junction to Independence.
Yard limits extend one-half mile east of South Montesano to one-half mile west of South Montesano, including Montesano Branch.
Yard limits extend from one-quarter mile east of Cosmopolis to one-quarter mile west of Aberdeen passenger station on eastward main track.
Yard limits extend from one-half mile west of Tono to end of track east of Tono.
Yard limits at Sherman apply only on branch.
- No. 3. Referring to Rule 221-A, all trains will obtain clearance at Arlington and Hood River. Unnecessary to whistle for train order signal at these stations. Trains will not whistle for train order signal at Aberdeen, Cosmopolis and Independence but will be governed by position of signal at these stations. Referring to Rule 221, on branch lines train order signal lights will not be kept burning after passage of regular trains for the day.
- No. 4. Referring to Rule 504, trains will wait five minutes after flagman has departed.
- No. 5. Referring to Rule 87; within Automatic Block Signals Limits extra trains may pass or run ahead of second class trains without train order authority.
- No. 6. White flag displayed will indicate cars or L. C. L. freight to be moved. Trains doing local work will be governed accordingly.
- No. 7. Trains (except passenger) consisting of more than fifteen cars will cut off engine to take water, and will also cut off way cars before spotting.
- No. 8. A buffer car (**not to be occupied by passengers**) will be used on passenger trains between locomotive and cars occupied by passengers.
- No. 9. Helper enginemen will be furnished copies of all train orders affecting movement of trains while being helped.
- No. 10. In order to avoid damage to equipment in stopping trains, and to avoid excessive speed over light grades and through sags, helper enginemen located intermediately or on rear of trains, will work only sufficient steam to keep up the slack.
- No. 11. Train registers will not be used as a means of identifying extra trains.
- No. 12. Trainmen and Enginemen are subject to the Rules and Regulations of Northern Pacific Terminal Co. while in their yard.
- No. 13. All Trains and Engines will approach crossing of United Railway Co. track on Front Street, Portland, prepared to stop before going over crossing, expecting to find crossing occupied.
- No. 14. Second District trains will not obtain clearance at Portland or North Portland Jct.
- No. 15. All trains will receive proceed signal from bridge tender before passing on to draw of draw bridges at Tacoma, Montesano and Aberdeen.
- No. 16. Sand will not be used on draw bridges.
- No. 17. Junction switch at Helsing Junction will be left set and locked for line to Centralia. Junction switch at Tacoma Junction will be left set for C. M. & St. P. track. Junction Switch 1500 feet east of Tidewater will be left set for Crossover to Northern Pacific main track. Wye switch on Montesano Branch will be left set for east leg of wye. Double track switch, Aberdeen, located 250 feet east of passenger station, will be left set for eastward trains.
- No. 18. Black River is initial station for all eastward trains. First and second class trains will register by registering ticket (Form 2642) at Black River. O.-W. R. & N. eastward first and second class trains will procure check of register (Form 2529) from operator at Black River. Second class and extra trains only will register and receive clearance card (Form 2643) at Argo.
- No. 19. When passing over Willamette River Bridge between Portland and East Portland, a trainman will remain at rear of train with hand on air valve of tail hose so that emergency brake can be applied if necessary.

SPEED RESTRICTIONS

- No. 20. Passenger trains, mail and express trains and light engines will not exceed a speed of 50 miles per hour and other trains will not exceed a speed of 30 miles per hour.
- No. 21. Trains will not exceed a speed of 30 miles per hour around 6, 7 and 8 degree curves and 25 miles per hour around 9 and 10 degree curves.
- No. 22. In any class of service, engines of Consolidation and Mikado class will not exceed a speed of 30 miles per hour and engines of Mallet class will not exceed a speed of 15 miles per hour.
- No. 23. Maximum speed on **descending** grades: on Shaniko Branch, Klondike to Gibson, passenger trains 25 miles per hour, freight trains 12 miles per hour, and Gibson to Biggs, passenger trains 20 miles per hour and freight trains 10 miles per hour; on Condon Branch, Mile Post 37 to Mile Post 29, passenger trains 25 miles per hour, freight trains 12 miles per hour, and Mile Post 20 to Rock Creek, passenger trains 25 miles per hour and freight trains 12 miles per hour
- No. 24. Passenger trains will not exceed a speed of 20 miles per hour on East Portland Hill when helper engine is used on rear of train, and must cut off such helper just east of Sandy Road crossing, except in cases of unusually heavy trains. Helper engineers will not work more steam than is absolutely necessary.
- No. 25. Passenger trains will not exceed a speed of 30 miles per hour and freight trains 20 miles per hour in either direction between Eagle Creek and Mile Post 42.
- No. 26. Westward trains will not exceed a speed of 15 miles per hour through turnout at either end of gauntlet track over Des Chutes River Bridge, and through turnout onto westward track at Biggs.
- No. 27. Eastward trains will not exceed a speed of 15 miles per hour through turnout onto eastward track at Crates.
- No. 28. When sand is blowing, during foggy or stormy weather, and at points where there is liability of tracks being obstructed, trains will be handled with care and under control.
- No. 29. Slow boards and caution signals will be erected one-fourth mile from the point which they are intended to cover. Permanent slow boards are erected as follows: First District—Tunnel No. 3; Second District—Mile Posts 14 and 44, Hoquiam Branch.
- No. 30. Westward trains will stop before crossing Sandy Road, M. P. 3.
- No. 31. Trains handling logs will not exceed a speed of 15 miles per hour at any point.

SPECIAL INSTRUCTIONS—Continued

MOVEMENTS BETWEEN ST. JOHNS JCT. AND PENINSULA JCT.

- No. 32. The Train Staff System is in operation between St. Johns Jct. and Peninsula Jct. All trains, yard engines and light engines moving between these points will be governed by Train Staff System Rules. St. Johns Jct. and Peninsula Jct. are staff stations.
 Train order semaphores at St. Johns Jct. and Peninsula Jct. indicate the limits of staff block.
 Cars will not be shoved through tunnel ahead of engine.
 Headlights will be kept burning on all engines run between St. Johns Jct. and Peninsula Jct. during day and night.
 Westward trains will be governed by position of semaphore signals located 600 feet east of east portal of tunnel and not proceed until signal is clear, securing staff at staff station.
 When approaching staff stations, should view be obstructed by reason of snow, fog, etc., and engineer is doubtful as to location, he will stop, and if necessary send flagman ahead to note position of signals and establish whereabouts of train.

AIR BRAKES.

- No. 33. Trainmen will be particular to know that air is cut in on all cars picked up, and before descending heavy grades must know that all good-order air brakes are cut into the train line. Hand brakes must be used on non-air and cut-out cars descending heavy grades.
- No. 34. Pressure Retaining Valves will be used on all freight trains descending grades between: Montavilla and East Portland; Nigger Ridge and McDonalds; Klondike and Biggs; Sandon and Hay Canyon; Condon and Rock Creek. On passenger trains descending grades between Wasco and Biggs, Condon and Rock Creek.
- No. 35. The braking power on engines helping or pushing trains will be cut into the train line and particular attention be given to cutting in of driving brakes. When helpers are used ahead of regular engine the regular engineer will set air on train to be released by helper engineer, and vice versa when this helper cuts off.
- No. 36. All westward freight trains will stop at Gibson and inspect train as per Rule 16, Rules and Regulations Governing Air Brakes, etc.

TRAIN ORDERS.

- No. 37. Within Automatic Block Signal limits between Umatilla and Portland and between Black River and Seattle:
 Form "19" train order may be issued to restrict the superiority of a train, except that Form 31 must be used (1) when orders are delivered at a non-telegraph or closed telegraph station. (See Rule 217). (2) When necessary to restrict a train which has been cleared or the engine of which has passed train order signal. (See Rule 219). (3) When issuing an order Form "G", example 3. (4) When giving any train right over all trains. (5) When reducing a time order where necessary that dispatcher have signature of superior trains before completing order to an inferior train.
 Operator will fill out clearance, designating thereon numbers of all orders, (Forms 19 and 31), repeat to Dispatcher train and order numbers as they appear on clearance and obtain O. K. with time and Superintendent's initials, writing same before delivery in blank space. In case of wire failure Operator will issue clearance without O. K. from Dispatcher. Operator will retain carbon copy of clearance.
 Dispatcher must write train and order numbers in his train order book as transmitted by operator from clearance, and must designate time clearance was made O. K., not transmitting O. K. unless operator repeats numbers of all orders to be delivered to the train to which clearance is addressed.
 When "19" order restricting superiority is issued at station where superiority is restricted, train must be stopped by operator before delivery of order.
 Conductor's and Engineer's attention is called to the importance of approaching at a moderate rate of speed telegraph offices where orders are to be received. Also to the necessity of carefully checking clearance to ascertain positively that clearance is properly addressed and that orders received are those called for by clearance.

RATING OF LOCOMOTIVES IN TONS OF 2000 POUNDS

CLASSIFICATION	ENGINE NUMBERS	SHERMAN and BEND						BIGGS and SHANIKO						ARLINGTON and CONDON				HEPPNER JCT. and HEPPNER			CENTRALIA and HOQUIAM				CENTRALIA and TONO										
		EASTWARD			WESTWARD	EASTWARD			WESTWARD	EASTWARD		WESTWARD	EASTWARD		WESTWARD	EASTWARD		WESTWARD	EASTWARD	WESTWARD	EASTWARD	WESTWARD													
		Sherman to North Jct.	North Jct. to South Jct.	South Jct. to Madras	Madras to Redmond	Redmond to Bend	Terbonne to Culver	Biggs to Gibson	Gibson to Sandon	Sandon to Grass Valley	Grass Valley to Shaniko	Shaniko to Grass Valley	Grass Valley to Moro	Hay Canyon to Sandon	Arlington to Eddy	Eddy to Rock Creek	Rock Creek to Condon	Condon to Rock Creek	Rock Creek to Arlington	Heppner Jct. to Lone	Lone to Lexington	Lexington to Heppner	Hoquiam to So. Aberdeen	So. Aberdeen to Centralia	Centralia to So. Aberdeen	So. Aberdeen to Hoquiam	Centralia to Tono	Tono to Centralia							
E-57 $\frac{17}{4}$	51	57 to 60, 62, 64.....						370	465	220	360	400	575	75	170	165	205	510	220	160	145	290	75	600	320	505	390	370	390	780	1000	390	855	MAX	
E-63 $\frac{17}{4}$	54	65 to 70 }.....						365	460	215	350	395	570	70	170	155	195	460	210	145	135	260	65	550	290	455	350	335	355	705	905	355	775	MAX	
E-63 $\frac{17}{4}$	55	71 to 73 }.....																																	
E-64 $\frac{16}{4}$	68	80 to 87.....						510	635	305	490	560	780	90	210	210	260	615	295	200	235	350	114	750	375	610	470	445	470	965	1220	470	1034	MAX	
T-55 $\frac{16}{4}$	71	112 to 119.....																																	
A-81 $\frac{20}{4}$	106	88 to 102.....						690	865	410	660	715	1060	110	285	275	350	815	370	255	305	381	125	980	455	810	625	590	620	1240	1595	620	1360	MAX	
M-57 $\frac{16}{4}$	91	103 to 111.....						520	650	310	500	565	800	95	225	215	270	645	310	200	245	360	146	800	593	640	490	465	470	965	1220	470	1034	MAX	
T-63 $\frac{16}{4}$	92	130 to 135.....						535	670	315	510	645	825	115	230	250	285	670	350	220	258	385	150	950	610	665	510	485	510	1020	1310	510	1120	MAX	
M-55 $\frac{16}{4}$	108	c. s. 10.....						680	845	415	650	735	1030	140	285	265	330	780	380	260	295	455	171	960	625	790	610	570	600	1200	1548	600	1315	MAX	
T-63 $\frac{20}{4}$	113	136 to 147.....						690	865	415	660	745	1060	145	290	275	330	815	400	260	305	470	180	980	775	810	625	590	624	1260	1620	624	1340	MAX	
C-51 $\frac{20}{4}$	117	160 to 164.....						770	955	470	740	835	1170	173	320	300	374	910	500	300	364	530	195	1075	870	910	700	665	700	1405	1800	700	1540	MAX	
T-57 $\frac{20}{4}$	119	170 to 173 }.....						830	1035	485	785	905	1270	180	335	325	405	960	485	340	365	560	208	1210	953	965	740	705	740	1485	1905	740	1630	MAX	
T-64 $\frac{15\frac{1}{2}}{4}$	139	179 to 184 }.....																																	
P-77 $\frac{20}{4}$	123	190 to 193 }.....						835	1050	505	800	935	1300	180	360	335	420	1020	495	320	385	590	200	1185	1015	965	740	705	740	1485	1905	740	1630	MAX	
P-77 $\frac{17\frac{1}{2}}{4}$	138	194 to 197 }.....																																	
P-77 $\frac{20}{4}$	145	198 to 207 }.....																																	
T-57 $\frac{20}{4}$	125	174 to 178.....						890	1100	540	850	965	1345	190	365	365	440	1030	500	360	420	590	240	1250	1015	1015	785	745	710	1425	1835	710	1720	MAX	
P-77 $\frac{20}{4}$	170	208 to 209.....						1140	1405	685	1100	1220	1750	205	450	435	580	1290	615	425	506	760	250	1595	1390	1330	1030	950	1010	2020	2595	1010	2218	MAX	
P-77 $\frac{20}{4}$	170	210 to 215.....						1140	1405	685	1100	1220	1750	205	450	435	580	1290	615	425	506	760	250	1595	1390	1330	1030	950	1010	2020	2595	1010	2218	MAX	
T-69 $\frac{20}{4}$	159	250 to 262.....						990	1245	615	980	1053	1520	190	410	395	500	1175	535	370	445	617	226	1465	1200	1170	900	855	900	1800	2310	900	1975	MAX	
T-63 $\frac{20}{4}$	160	300 to 305.....						1080	1340	650	1035	1170	1640	200	416	425	535	1240	585	400	490	695	252	1530	1315	1195	920	870	915	1830	2350	915	2010	MAX	
C-55 $\frac{18}{4}$	143	327 to 329.....						990	1245	615	980	1100	1520	205	444	430	545	1275	550	420	445	675	267	1530	1315	1170	900	855	900	1800	2310	900	1975	MAX	
C-57 $\frac{15\frac{1}{2}}{4}$	176	330 to 338 }.....						1200	1505	745	1170	1120	1720	220	465	460	585	1305	625	435	480	755	275	1625	1400	1300	1000	950	1020	2041	2625	1020	2220	MAX	
C-57 $\frac{20}{4}$	163	344.....																																	
C-57 $\frac{15\frac{1}{2}}{4}$	169	339 to 343 }.....																																	
C-57 $\frac{20}{4}$	179	345 to 349 }.....																																	
C-57 $\frac{20}{4}$	187	350 to 388.....						1305	1615	800	1255	1430	1980	275	520	500	650	1460	700	480	555	870	335	1820	1495	1495	1150	1090	1150	2300	2950	1150	2520	MAX	
MK-57 $\frac{20}{4}$	205	500 to 565.....						1445	1815	895	1385	1550	2215	305	600	580	720	1635	770	530	665	940	365	2020	1630	1660	1285	1205	1270	2535	3255	1270	2780	MAX	
MC-57 $\frac{20}{4}$	394	700 to 702.....						2870	3550	1760	2760	3220	4355	500	1180	1145	1420	3200	1540	1055	1250	1967	588	4000	3395	3290	2530	2400	2530	5070	6500	2530	5555	MAX	

CLASS.
 "E" — Eight Wheelers.
 "A" — Atlantic Type.
 "P" — Pacific Type.
 "T" — Ten Wheeler.
 "M" — Moguls.
 "C" — Consolidation Engines.
 "TW" — Twelve Wheelers.
 "S" — Switch.
 "MK" — Mikado.
 "MC" — Mallet Compound.

These ratings include the total weight of train, exclusive of engine and tender, which the different classes of locomotives will haul in each direction between the stations shown.

Between stations for which no rating is shown, maximum will apply.

EXAMPLE:—Consolidation engine having 57 inch drivers, Cylinders 22 inch diameter and 30 inch stroke, and weighing 187,000 pounds on Drivers:

$$C-57 \frac{22}{30} 187$$

LIST OF SURGEONS.

NAME	LOCATION	DISTRICT	NAME	LOCATION	DISTRICT
DR. K. A. J. MACKENZIE, Chief Surgeon.	PORTLAND, Corbett Bldg. } TELEPHONES: HOME A1267 PACIFIC MAIN 267	O-W. R. & N. Co., System.	DR. WOOD & SAMUELS, Oculist and Aurist.	SEATTLE, Cobb Bldg. MAIN 2205	Portland-Seattle.
DR. F. M. TAYLOR, Asst. Surgeon.		O-W. R. & N. Co., System.	DR. WM. P. O'ROURKE, Assistant Surgeon.		SEATTLE (Georgetown).
DR. J. H. JESSOP, Asst. Surgeon.	PORTLAND, Corbett Bldg. }	O-W. R. & N. Co., System.	DR. F. D. MERRITT, District Surgeon.	AUBURN.	Seattle-Tacoma.
DR. W. H. NORTON, Asst. Surgeon.	PORTLAND, Corbett Bldg. }	O-W. R. & N. Co., System.	DR. CHAS. JAMES, District Surgeon.	TACOMA, 304 Berlin Bldg.	Auburn-Tenino.
DR. GEO. AINSLIE, Chief Oculist.	PORTLAND, Oregonian Bldg.	O-W. R. & N. Co., System.	DR. W. A. MILLINGTON, District Surgeon.	TENINO.	Tacoma-Centralia.
DRS. DICKSON, COGHLAN AND DAVIS, Nose & Throat.	PORTLAND, Selling Bldg.	O-W. R. & N. Co., System.	DR. DAVID LIVINGSTONE, District Surgeon.	CENTRALIA.	Tenino-Winlock.
DR. A. M. WEBSTER	PORTLAND, 1054 Hawthorne Ave.	E. Portland, South of Sullivan's Gulch.	DR. R. H. CAMPBELL.	VADER.	Centralia-So. Elma.
DR. C. HOLCOMB, District Surgeon.	ALBINA.	Albina to The Dalles and Vancouver.	DR. C. P. FRYER, District Surgeon.	CASTLE ROCK.	Centralia-Tono.
DR. B. B. BACHELDER.	BRIDAL VEIL.		DR. C. W. BALES, District Surgeon.	KELSO.	Winlock-Castle Rock.
DR. J. F. WATT, District Surgeon.	HOOD RIVER.	Portland to The Dalles.	DR. LUTHER M. SIMS, District Surgeon.	KALAMA.	Winlock-Kelso.
DR. J. M. LOWE, District Surgeon.	THE DALLES.	Hood River to Umatilla.	DR. J. T. GUERIN, District Surgeon.	VANCOUVER.	Castle Rock-Kalama.
DR. THOMPSON COBERTH.	THE DALLES.	Hood River to Umatilla.	DR. HANNIBAL BLAIR, District Surgeon.	ELMA.	Kelso-Vancouver.
DR. J. F. R. FAIRBAIRN, District Surgeon.	CULVER.	Bend Branch.	DR. EDMUND A. SIZER, District Surgeon.	COSMOPOLIS.	Kalama-Albina.
DR. B. FERRELL, District Surgeon.	BEND.	Bend Branch.	DR. I. R. WATKINS, District Surgeon.	ABERDEEN.	Grays Harbor and North River Branches.
DR. C. L. POLEY, District Surgeon.	MORO.	Biggs to Shaniko.	DR. R. F. HUNTER, District Surgeon.	HOQUIAM.	
DR. M. B. TAYLOR, District Surgeon.	GRASS VALLEY.	Biggs to Shaniko.	DR. J. H. FITZ, District Surgeon.	MONTEBANO.	
DR. J. W. DONNELLY, District Surgeon.	ARLINGTON.	Arlington to Condon.			
DRS. MILLER AND WILHELM, District Surgeons.	CONDON.	Condon to Arlington.			
DR. H. T. ALLISTON, District Surgeon.	HEPPNER.	Heppner Branch.			
DR. MONTGOMERY RUSSELL, Division Surgeon.	SEATTLE, 620 Leary Bldg. } MAIN 90	Portland-Seattle.			
DR. F. R. UNDERWOOD, Assistant Surgeon.	SEATTLE, 620 Leary Bldg }	Portland-Seattle.			

AMBULANCE AT PORTLAND IS LOCATED AT RED CROSS AMBULANCE CO., 391 DAVIS ST., TELEPHONES, MAIN 78 AND A 1211.

STANDARD CLOCKS.

PORTLAND	TELEGRAPH	OFFICE
ALBINA,	TELEGRAPH	"
THE DALLES,	TELEGRAPH	"
SHANIKO,	TELEGRAPH	"
UMATILLA,	TELEGRAPH	"
CENTRALIA	DISPATCHER'S	"
SEATTLE,	TELEGRAPH	"
COSMOPOLIS,	TELEGRAPH	"
ABERDEEN	TELEGRAPH	"
HOQUIAM	TELEGRAPH	"

LICENSED WATCH INSPECTORS.

WEBB C. BALL, General Time Inspector,	SAN FRANCISCO
BELDING & SAXTON Local Watch Inspectors,	PORTLAND
H. H. HEIDE,	ALBINA
D. LINDQUIST,	THE DALLES
HOUGHTON & HUNTER,	SEATTLE
R. A. SUTIFF,	GEORGETOWN
M. L. DAVIS JEWELRY CO.,	TACOMA
BEN SALIK,	CENTRALIA
O. BORG,	HEPPNER
H. F. SHANKS,	ARLINGTON
F. W. STRAUB,	HOQUIAM

B. E. PALMER, Superintendent, - - - Portland.

F. L. COYKENDALL, Assistant Superintendent, - - - Portland.

W. H. GUILD, Assistant Superintendent, - - - "

M. B. BAYER, Trainmaster - - - Tacoma.

E. M. RINGER, Chief Dispatcher - - Portland.

E. A. HACKETT, Night Chief Dispatcher, " " "

F. F. SPAULDING, Dispatcher, - - - " " "

H. D. AULD, " - - - " " "

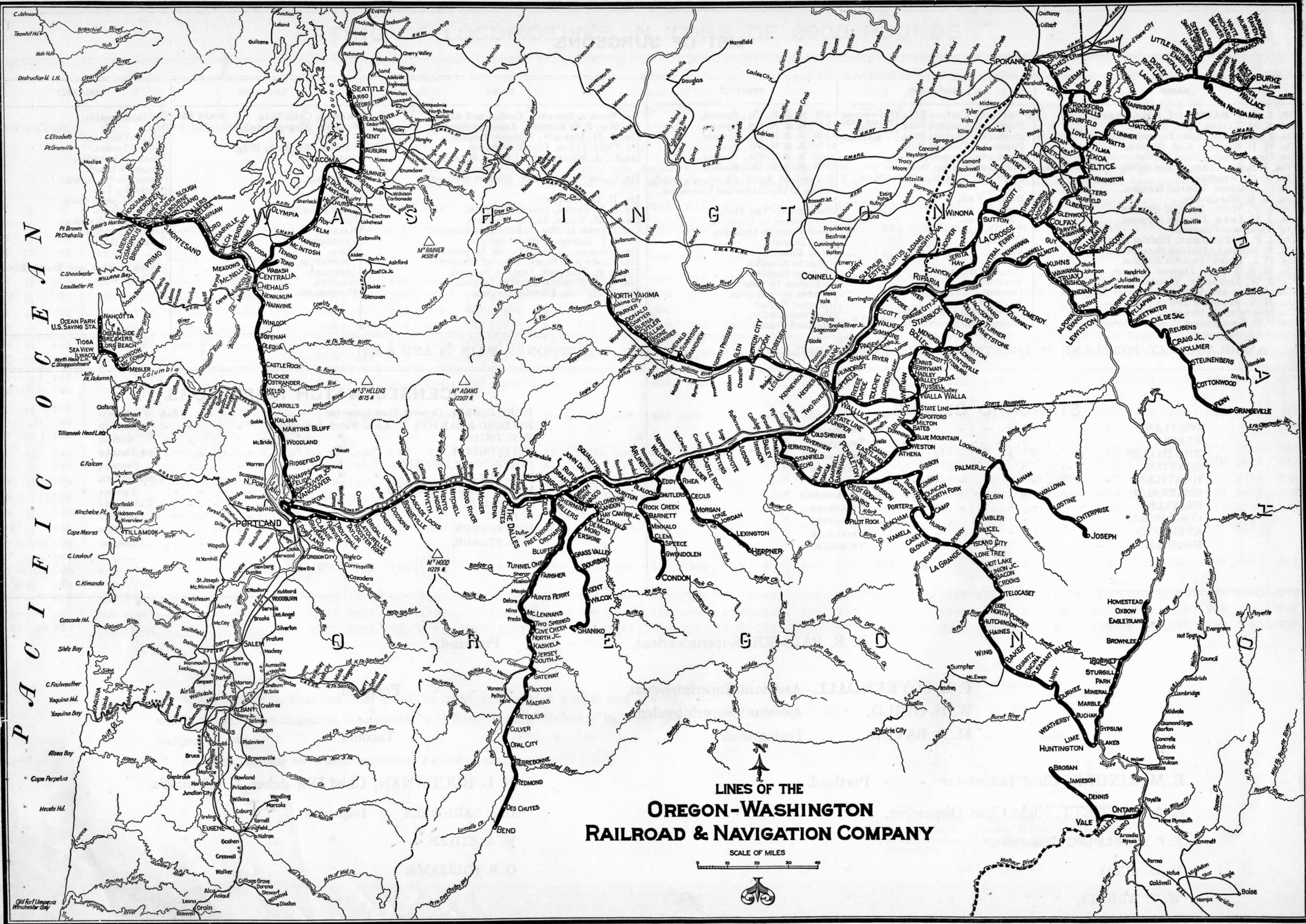
W. T. WRIGHT, " - - - " " "

H. L. BUCHANAN, Chief Dispatcher - Centralia.

D. A. SAUNDERS, Dispatcher, - - - "

W. A. STILES, " - - - "

G. B. WILLIAMS, " - - - "



PACIFIC

ORIGON-WASHINGTON RAILROAD & NAVIGATION COMPANY

SCALE OF MILES

