

INTERSTATE COMMERCE COMMISSION
WASHINGTON

INVESTIGATION NO. 3000
THE NASHVILLE, CHATTANOOGA & ST. LOUIS
RAILWAY COMPANY
REPORT IN RE ACCIDENT
AT ATLANTA, GA., ON
JULY 8, 1946

SUMMARY

Railroad: Nashville, Chattanooga & St. Louis
Date: July 8, 1946
Location: Atlanta, Ga.
Kind of accident: Rear-end collision
Trains involved: L. & N. freight : A. C. L. passenger
Train numbers: Extra 1337 North : 112
Engine numbers: 1337 : 7351
Consist: 15 cars, caboose : 7 cars
Estimated speed: Standing : 12 m. p. h.
Operation: Timetable and automatic block-signal system; yard limits
Track: Double; 4°03' curve; 0.51 percent descending grade northward
Weather: Clear
Time: 1:52 a. m.
Casualties: 13 injured
Cause: Failure properly to control speed of following train in accordance with signal indications

INTERSTATE COMMERCE COMMISSION

INVESTIGATION NO. 3000

IN THE MATTER OF MAKING ACCIDENT INVESTIGATION REPORTS
UNDER THE ACCIDENT REPORTS ACT OF MAY 6, 1910.

THE NASHVILLE, CHATTANOOGA & ST. LOUIS RAILWAY COMPANY

August 20, 1946.

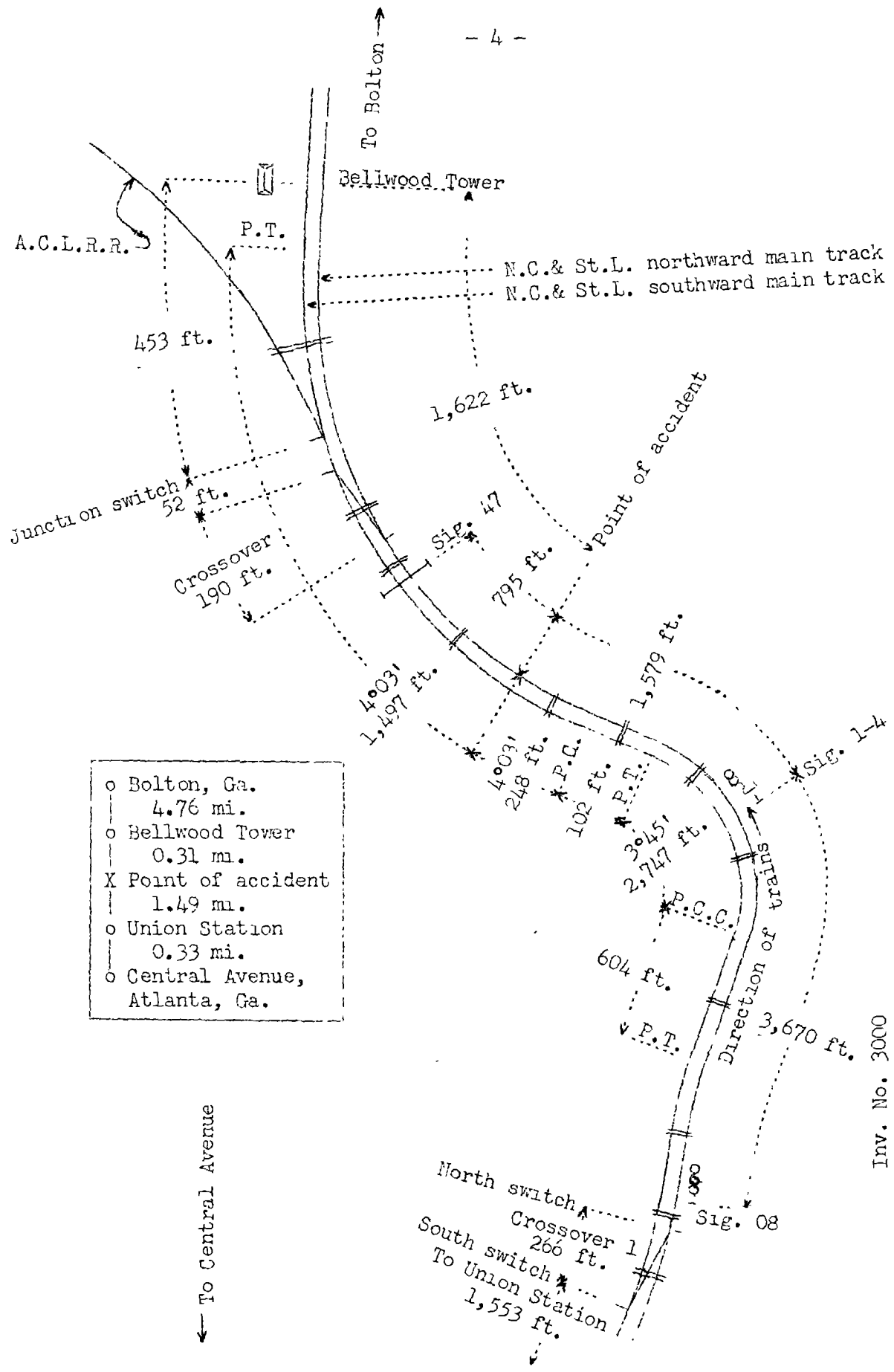
Accident at Atlanta, Ga., on July 8, 1946, caused by
failure properly to control the speed of the fol-
lowing train in accordance with signal indications.

REPORT OF THE COMMISSION¹

PATTERSON, Commissioner:

On July 8, 1946, there was a rear-end collision be-
tween a Louisville and Nashville Railroad freight train
and an Atlantic Coast Line Railroad passenger train on the
line of the Nashville, Chattanooga & St. Louis Railway at
Atlanta, Ga., which resulted in the injury of 12 passengers
and 1 chair-car attendant.

¹Under authority of section 17 (2) of the Interstate Com-
merce Act the above-entitled proceeding was referred by the
Commission to Commissioner Patterson for consideration and
disposition.



- o Bolton, Ga. 4.76 mi.
- o Bellwood Tower 0.31 mi.
- X Point of accident 1.49 mi.
- o Union Station 0.33 mi.
- o Central Avenue, Atlanta, Ga.

Inv. No. 3000
 Nashville, Chattanooga & St. Louis Railway
 Atlanta, Ga.
 July 8, 1946

Location of Accident and Method of Operation

This accident occurred on the Atlanta Terminal Division, which extends between Central Avenue, Atlanta, and Bolton, Ga., 6.82 miles. In the vicinity of the point of accident this is a double-track line over which movements with the current of traffic are operated by timetable and an automatic block-signal system. The accident occurred within yard limits on the northward main track, at a point 1.82 miles north of Central Avenue, 1.49 miles north of Union Station, Atlanta, and 1,322 feet south of Bellwood Tower. Trains of the L. & N. are regularly operated over this line, and trains of the A.C.L. are regularly operated over that portion of the line extending between Union Station and Bellwood Tower. From the south there are, in succession, a tangent 604 feet in length, a compound curve to the left, the maximum curvature of which is 3°45', 2,747 feet, a tangent 102 feet and a 4°03' curve to the right 248 feet to the point of accident and 1,497 feet northward. The grade for north-bound trains varies between 0.13 percent and 0.89 percent descending throughout a distance of 4,790 feet, then it is, successively, level 310 feet, 0.43 percent descending 300 feet, 0.70 percent descending 600 feet and 0.51 percent descending 253 feet to the point of accident and 247 feet northward.

The south and north switches of a hand-operated trailing-point crossover, hereinafter referred to as crossover 1, which connects the northward and southward main tracks, are, respectively, 1,553 and 1,819 feet north of Union Station. Within interlocking limits at Bellwood Tower a single-track line of the A.C.L. connects with the southward main track of the N.C. & St.L. The junction switch is 453 feet south of the tower. The south and north switches of a facing-point crossover, which connects the N.C. & St.L. northward and southward main tracks, are, respectively, 695 and 505 feet south of the tower.

Automatic signals 08 and 1-4, governing north-bound movements on the northward main track, and interlocking home signal 47, governing north-bound movements through the interlocking at Bellwood Tower, are, respectively, 5,249 and 1,579 feet south and 795 feet north of the point of accident. Signal 08 is a dwarf signal of the three-indication color-light type. Signal 1-4 is of the three-indication color-light type, and is mounted on a bracket-mast. Signal 47 is of the two-arm, upper quadrant, semaphore type, and is mounted on a signal bridge. All the signals mentioned are continuously lighted. The involved aspects and corresponding indications of these signals are as follows:

<u>Signal</u>	<u>Aspect</u>	<u>Indication</u>
08	Yellow	Caution-Rule 510 (h).
1-4	Red	Stop-Rule 510 (c).
47	Red	Stop.

Operating rules read in part as follows:

83. A train must not leave its initial station on any division, or a junction, or pass from double to single track, until it has been ascertained whether all trains due, which are superior, or of the same class, have arrived or left.

* * *

93. Certain yards will be indicated by yard or station limit signs. Within such limits the main track may be used, protecting against first and second class trains. Third class and extra trains must move on the main track under such control that they can stop within the range of their vision.

510 (c). When an Intermediate Block Signal indicates Stop, train will stop, * * * and then proceed to next signal under slow speed, expecting to find one or more of the conditions mentioned in Rule 510 (g); * * *

510 (g). When a signal indicates Stop, one or more of the following conditions may exist:

(a) A train or other obstruction in the block.

* * *

510 (h). A train passing a block signal indicating Caution must immediately reduce speed to one half maximum authorized speed and as much slower as necessary to be able to stop before passing the next block signal or interlocking signal applying, if indicating Stop.

Time-table special instructions read in part as follows:

North bound L. & N. trains originating in Atlanta Joint Terminals Hulsey Yard must ascertain from Train Controller * * * before leaving that yard or at Union Station, Atlanta, whether all passenger trains due to leave Union Station have left and, if not, must not precede them unless they have sufficient time to reach Bellwood Tower * * * ahead of such passenger trains without causing them delay.

Hulsey Yard is 1.9 miles south of Union Station.

1. Trains using a main track within yard or station limits as authorized by Rule 93, will, in addition to protecting as required against first class trains, protect against other trains if such other trains have not a view of train thus using that main track of four hundred (400) feet or more, * * *

* * *

2. Within yard or station limits, all trains except first class trains will, when practicable, keep posted as to first class trains with the view of not delaying them, but while in position to be struck by such trains must fully protect against them as required by Rule 99.

The maximum authorized speed for the A.C.L. train was 20 miles per hour.

Description of Accident

Extra 1337 North, a north-bound L. & N. freight train, consisting of engine 1337, 15 cars and a caboose, en route from Hulsey Yard to Marietta, Ga., 12.33 miles north of Bellwood Tower, departed from Hulsey Yard about 1:30 a. m., passed Union Station about 1:45 a. m., and stopped about 1:51 a. m. on the northward main track at signal 47, which displayed stop. About 1 minute later the rear end of this train was struck by No. 112.

No. 112, a north-bound first-class A.C.L. passenger train, consisted of one tavern-observation car, two coaches, one dining car, two coaches, one passenger-baggage car and engine 7351, headed south, in the order named. All cars were of steel construction. This train, making a back-up movement from Union Station to the A.C.L. connection at Bellwood Tower, departed from Union Station on the southward main track at 1:48 a. m., 1 hour 20 minutes late, proceeded through crossover 1 to the northward main track, passed signal 06, which displayed proceed-prepared-to-stop-at-next-signal, passed signal 1-4, which displayed stop-then-proceed, and while moving at an estimated speed of 12 miles per hour it struck Extra 1337 North at a point 1,579 feet north of signal 1-4.

The caboose of Extra 1337 was demolished. The first car of No. 112 was derailed to the left and stopped practically upright and at an angle of about 15 degrees to the track, with the front end about 20 feet north of the point of collision. This car was badly damaged. The front truck of the second car was derailed, and this car was slightly damaged.

The weather was clear at the time of the accident, which occurred about 1:52 a. m.

Discussion

The investigation disclosed that about 1:25 a. m. the conductor of Extra 1337 North received information at Hulsey Yard by telephone from the train dispatcher at CTC Tower, about 7 miles north of Hulsey Yard, that all overdue first-class trains had arrived and departed from Union Station. No. 112, a north-bound first-class train due to leave Union Station at 12:28 a. m., had not departed from Union Station at the time this information was given the conductor of Extra 1337 North. Extra 1337 North departed from Hulsey Yard about 1:30 a. m., passed Union Station about 1:45 a. m. and stopped on the northward main track within yard limits about 1:51 a. m., in the vicinity of signal 47, which displayed stop. About 1 minute later the rear end of Extra 1337 North was struck by No. 112.

The members of the crew of Extra 1337 said they did not know until after the accident occurred that No. 112 had not departed from Union Station. Extra 1337 stopped at crossover 1 to line the north switch for movement of their train on the northward main track. At that time the flagman of No. 112 was in the vicinity of the crossover. He said he informed the front brakeman of Extra 1337 that No. 112 was about ready to depart from Union Station, but the front brakeman said the only information given him by the flagman was that the flagman was providing protection for a nearby street crossing. The yardmaster in charge of movements in the vicinity of Union Station said that he had instructed the flagman of No. 112 not to permit any north-bound movement to pass crossover 1 ahead of No. 112. However, the flagman permitted Extra 1337 to proceed and did not inform either the yardmaster or the conductor of No. 112 that Extra 1337 had preceded the movement of No. 112. When Extra 1337 stopped at the point where the accident occurred the conductor and the flagman of this train were on the caboose. Because of the information they had received regarding overdue first-class trains and because the view to the rear of their train exceeded a distance of 400 feet they understood that flag protection against following movements within yard limits was not required. The flagman said that when he saw the lighted red marker lamps of No. 112 about 900 feet distant he immediately ran southward and was giving stop signals with a lighted red lantern from a point about 120 feet south of the rear of his train when the first car of No. 112 passed him. The marker lamps on the caboose of Extra 1337 were lighted and displayed red to the rear.

No. 112 consisted of seven passenger-train cars, which were being pushed ahead of the engine. The engine was in backward motion. The air-brakes and the train air-signal system were tested and functioned properly prior to departure of this train from Union Station. When this train proceeded northward from Union Station the conductor was at the north end of the first car, which was a tavern-observation car. The

conductor understood that he was required to control the movement of the train either by the use of the conductor's air-valve, located at the north end of the car, or by signalling to the engineer on the train air-signal system. He said his train was moving about 20 miles per hour when the first car passed signal 08, which displayed proceed-prepared-to-stop-at-next-signal, and continued to be about 20 miles per hour until this car was a short distance south of signal 1-4, which displayed stop-then-proceed. When he saw the stop-and-proceed indication displayed by signal 1-4 he signalled on the train-air signal for the engineer to stop the train. However, the train was not stopped at this signal and the speed was not reduced until the conductor applied the brakes in emergency when he saw the lighted marker lamps of the preceding train immediately prior to the collision. The conductor said he did not see or hear any flagging signal prior to the accident. The enginemen of No. 112 said that they did not hear any signal sounded on the train air-signal system until a signal was sounded to stop the train immediately before the collision occurred. The engineer said that he was making a service brake-pipe reduction in response to this stop-signal when the emergency application occurred. In tests after the accident the train air-brake and train air-signal systems functioned properly. If the speed of No. 112 had been controlled in accordance with the indications displayed by signals 08 and 1-4 this accident would not have occurred.

The investigation disclosed that during a considerable period of time prior to the accident no record had been made of the movement of A.C.L. trains in the territory involved on the N.C. & St.L. dispatcher's record of movement of trains and that the movement of these trains was not reported by the operator at Union Station to the N.C. & St.L. dispatcher. As a result of this practice, the train dispatcher was not informed that No. 112 had not departed from Union Station at the time he issued the information regarding overdue trains to the conductor of Extra 1337. This practice has now been discontinued.

Cause

It is found that this accident was caused by failure properly to control the speed of the following train in accordance with signal indications.

Dated at Washington, D. C., this twentieth day of August, 1946.

By the Commission, Commissioner Patterson.

(SEAL)

W. P. BARTEL,
Secretary.