

# Ottawa Items from Railway and Shipping World - 1900

01-Jan-1900 Page 2 New York Central

An important case was decided at the recent sessions at Ottawa by Judge Mosgrove. W.D. Lees, an Ottawa barrister, has an office also in the town of Russell, and in connection with his business there makes trips to that place using the O&NY line. In his statement of claim, Mr. Lees says the Co. held itself out as a common carrier and took and carried goods and passengers on its line for hire. From July 30 1898 until May 20 1899, Mr. Lees paid the Co. \$49.55 for railway fares and he claimed that the Co. has no right to collect that or any amount by law, because it had not complied with the provisions of the Railway Act. He therefore claimed he was entitled to the return of the money paid and also three times the amount of the money paid. He based his case on the section of the Railway Act which requires a railway company to publish in the Canada Gazette for a certain period its rates and the same must be approved by the Railway Committee. For non-compliance the railway company must return the fares and three times the fares to the passenger. It was shown that the company had not carried out these requirements of the Railway Act and for that reason the Judge gave a decision for Mr. Lees. Counsel for the defendants contended that Mr. Lees had paid the money voluntarily and had received value for services rendered. An appeal will be entered against the decision. A jury had been secured to try the case but it was not referred to them. From Ottawa comes an unconfirmed press report that there is a probability if this line, after it is completed this summer, being secured by the CPR. It is claimed that it will shorten the passenger times between Ottawa and New York by three hours.

01-Jan-1900 Page 3 Waltham

At a special meeting of shareholders in Montreal Dec. 15, the acceptance by the directors of H.J. Beemer's contract for the building of 9 miles of railway from Aylmer to Hull was ratified. The issue of \$180,000 bonds as collateral security to him was approved. of.

01-Jan-1900 Page 6 Winchester

At Smiths Falls, divisional offices, to cost \$6,000 will be built. Tea storehouses for the accommodation of the tea trade from the Orient, are situated at Smiths falls and it has become necessary to increase them. Their present capacity will be doubled at a cost of \$11,000. For this work the yards at Smiths Falls will be re-arranged.

01-Jan-1900 Page 7 Renfrew

The new freight building and offices at Ottawa are almost ready for occupation. The work of trestle filling along the line is progressing rapidly, the only trestles that are not filled being the Arnprior and Nepean ones. A station is being built at Golden Lake.

01-Jan-1900 Page 9 Waltham

The three miles which have been completed on the Aylmer-Hull extension from Aylmer to Deschenes have been approved by a government inspector. (Dec '99 pg. 353.)

01-Jan-1900 Page 9 New York Central

A Cornwall despatch of Dec. 16 says: "The Degnon, McLean Co. has closed down its works here for the winter. This year it has built a new pier on the site of the one that collapsed last year. This pier has been sunk by pneumatic caissons to bedrock, some 20 or 30 ft. below the river bottom. The pier which remained standing under the end of the sole remaining span of the South Bridge, has also been taken down and similarly rebuilt. Next spring it is understood that the D McL Co. will strengthen the piers of the big cantilever bridge over the North channel. One of these piers will be reproped with huge blocks of stones, which will protect it against the action of the ice. The other pier will be surrounded with a caisson of steel, which will be filled with concrete. The small pier on the canal bank will be taken down and rebuilt and the Co. is taking every precaution to make the bridge safe and strong.

01-Jan-1900 Page 10 Ottawa Terminal

The Canada Atlantic built about 400 boxcars at its Ottawa shops last year also a number of refrigerator cars.. the reason why the car shops have been temporarily closed is .. We have run out of car sills and wheels and as soon as we receive the necessary supply we will resume operations.

01-Jan-1900 Page 16 Kingston (CP)

The Kingston & Pembroke Ry. gives notice of application to the Dominion Parliament for authority to extend its line from Renfrew across the Ottawa River to Bryson, Que. and thence northward to the eastern branch of the Ottawa River.

01-Jan-1900 Page 16 Montreal and Ottawa

The Montreal and Ottawa Ry. gives notice of application to the Dominion Parliament for an Act extending the time within which it may complete its railway and connect it with the CPR in Ottawa and for other purposes.

01-Jan-1900 Page 18 Canada Atlantic

Early in Jan. a New York correspondent of a Montreal newspaper wired as follows:- "Some of the representatives of the Canada Atlantic Ry. were in New York a few days ago. They entered into negotiations with powerful capitalists for the sale of Mr. Booth's system. The price asked was \$14,000,000 for the line and also for terminal facilities in Montreal. These I am assured were valued at \$4,000,000 and the system itself, that is to say, the railway, at \$10,000,000." J.R. Booth says there is no truth in the story.

01-Jan-1900 Page 29 Ottawa Electric

The first car was run on the extension to Britannia Dec. 18, when the track was completed to within about a mile of Britannia. It is expected to complete the extension early in January. The Co. has purchased 12 acres of land at Britannia for park purposes. (Nov. '99 pg. 337.)

01-Feb-1900 Page 39 Ottawa Connecting Line

No decision has yet been arrived at as to the route which this line will take in crossing the City of Ottawa so as to connect the CPR's present Union Station near the Chaudiere Falls with the central station near the canal basin and Russell House. The Co. recently acquired a right of way across the city about 100 yards south of the Canada Atlantic track, but this location has been objected to very strongly by the city authorities, on the ground that it would necessitate a second level crossing at Bank Street and the Co. is being urged to use the Isabella Street route which would locate its tracks alongside the Canada Atlantic. Surveys of the latter route have been made, which show that it would cost much more than the route originally selected by the Co. (Dec '99 pg. 348).

01-Feb-1900 Page 41 Vankleek

A good deal of work is being done filling trestles and improving yards at Hawkesbury.

01-Feb-1900 Page 41 Ottawa Terminal

Work will not be started on the new Central station in Ottawa before next fall at the earliest, as the government military stores which are located on the site will not be vacated before then.

01-Feb-1900 Page 41 Interprovincial Bridge

On the south approach between Nepean Point and Sappers Bridge, work is being continued through the winter and it is expected to have all the substructure completed early in the spring. On Jan. 19 we were advised that the centre portion of one truss on the superstructure was in place on the Hull side and another one was being erected. (Dec, 1899, pg. 352.)

01-Feb-1900 Page 42 Maniwaki

On the extension from Gracefield to Maniwaki no track has yet been laid. The rock work is being proceeded with this winter with the intention of pushing the grading through to Maniwaki during next summer. (Nov. '99 pg. 327.)

01-Feb-1900 Page 43 Ottawa Terminal

As a solution of the difficulty which railways in Ottawa seem to experience in a marked degree at the present time, a terminal scheme is suggested by some local railway men and from the success attending such projects in other cities, it is by no means an unreasonable proposition. The fact, however, that some of the railway corporations are already secure in their rights and naturally inclined to tenaciously hold on to them is likely to have a militating effect against the successful accomplishment of any such scheme at the present time at least, or as long as the city is disposed to grant franchises which is perfectly within its province. A terminal system, as pointed out, would do much to mitigate difficulties experienced in the past and by no means unknown at present in local railway circles. The scheme as operated elsewhere consists in the construction of a belt line by a terminal company owning all the tracks as well as the depots and in the payment of their proportionate shares, allowing all roads to come in on an equal footing as well as being of benefit to industrial enterprises located in such a line. At the present time if a new railway wishes to enter a city it can get as far as the limits but no farther, inasmuch as older roads first on the scene have acquired control of the running powers. - Ottawa Citizen.

01-Feb-1900 Page 43 Waltham

Track having been laid on the Aylmer-Hull extension from Aylmer to Deschenes, work has been suspended for the winter. The intention is to resume operations as soon as the frost is out of the ground. (Jan. pg. 9.)

01-Feb-1900 Page 45 Ottawa Terminal

The Canada Atlantic will, it is said, build 700 boxcars of 70,000 lbs. capacity at its Ottawa shops this season. The shops were shut down recently on account of scarcity of material, but will soon be reopened, when about 400 men will be employed and 4 or 5 cars a day will be turned out. It is said that no locomotives or passenger cars will be added to the rolling stock this year. The locomotives are being overhauled in preparation for the busy season. Thirty cars, 40 ft. long, with a capacity of 70,000 lbs. have recently been completed at the Ottawa shops for use in President Booth's log traffic between the Upper Parry Sound district and Ottawa.

01-Feb-1900 Page 47 Canadian Pacific

W. Wallace, Roadmaster at Ottawa, having left the Co.'s service, the district formerly under his jurisdiction has been divided between Roadmasters J.M. Guenette and J. Jelly. Roadmaster Guenette's division embraces the Montreal and Ottawa line and the Chaudiere and Prescott branches. Roadmaster Jelly's division embraces the main line from Ottawa to Chalk River and the Brockville and Atlantic and North west branches.

01-Feb-1900 Page 57 Ottawa and Dundas Electric

Ottawa and Dundas Electric Railway. Notice is given of application to the Ontario Legislature to incorporate a company under this name to construct and operate a railway from Ottawa, through the townships of Gloucester and Osgoode and through the county of Dundas to some point on or near the St. Lawrence River, with branch lines.

01-Feb-1900 Page 57 Ottawa Electric

In order to provide against the disablement which an accident to the Co.'s power house would probably cause, a duplicate power plant consisting of a set of horizontal water wheels of a capacity of 1,800 h.p. directly connected to a generator of a similar capacity, is being installed. The new plant will be housed in fire-proof buildings.

(The Britannia line) will be ready about May 1 next. The western terminus is beautifully situated on the bay and is the only absolutely safe beach for bathing in the neighbourhood of Ottawa. This line should become very popular as the route is very picturesque.

Late last season, the city having decided to lay an asphalt roadway on Wellington Street between Lyon and the junction of Sparks Street, the Co. renewed its tracks for this distance putting down a 72 lbs. rail instead of the then existing 56 lbs. rail.

There is a financial statement and list of officers as well as comments on funding city street maintenance.

01-Mar-1900 Page 67 New York Central

High Court of justice in Toronto, 20 Feb. giving judgement of Lees vs. O&NY Ry. Summary of the case.

Held that it is plain that theory upon which this action as brought cannot be supported. To give effect to it would be to hold that a company whose tariff has not been sanctioned by the Governor in Council must not carry on its business and may not even make special contracts with travellers and that if it does so, and they and their goods are carried, and a reasonable charge paid, the traveller may recover it back. There is no warrant for this in any provision of the act. Nor is the plaintiff entitled to recover under section 290. The fares not being unreasonable nor excessive, it follows that they are neither unjust nor extortionate. Appeal allowed with costs and action dismissed with costs.

01-Mar-1900 Page 71 Ottawa Connecting Line

The route to be taken across the city to connect the Co.'s present Union station near Chaudiere Falls with the Central station near the canal basin and the Russell House is still undecided. The surveys have been completed and it is said that the latest proposal of the Co. is to use the Isabella Street route which would place its tracks alongside the Canada Atlantic. (Feb. pg. 39.)

01-Mar-1900 Page 74 Ottawa Terminal

The Canada Atlantic shops in Ottawa are running on regular time. The Co. proposed to build about 700 freight cars by July 1. They will be principally boxcars for grain traffic, but a number of refrigerator and other cars will also be constructed.

01-Mar-1900 Page 78 Other

Ottawa to St. Lawrence River. Application is being made to the Dominion Parliament to incorporate a company to build a railway from Ottawa through Gloucester and Osgoode townships to Metcalfé, thence to Winchester Springs, North Williamsburg, and Morrisburg with a branch line from Winchester to Inkerman, South Mountain and Iroquois and to extend branches through other portions of the counties of Carleton and Dundas.

01-Mar-1900 Page 93 Ottawa Electric

The extension to Britannia is now practically completed but will probably not be operated until early May as the traffic before then would not be of a paying character and the equipment is not yet completed. A promenade to extend about 800 feet into the river is being erected at Britannia Bay by the Co. (Jan. pg. 29.)

01-Apr-1900 Page 110 Canadian Pacific

The rumour that the Co. is going to build a short line between Ottawa and Arnprior, which comes to the front every spring, is again on deck. An engineer went over the ground some time ago and it is possible that the line, which would shorten the distance between the two points by about 10.5 miles, will be built sooner or later, but it does not appear that any decision has yet been arrived at in regard to it.

01-Apr-1900 Page 110 Ottawa Connecting Line

There is no truth in a report which has appeared widely in the daily press to the effect that the Co. is about to tunnel under Nepean Point to secure a western entrance to the Central station. (Mar. pg. 71.)

01-Apr-1900 Page 111 Ottawa Terminal

It is not expected that work will be started on the Central station in Ottawa this year, as it is not likely that the Department of Militia will vacate the military stores building in time. (Feb. pg. 41.)

01-Apr-1900 Page 111 Hammond

The Ontario Legislature has voted a subsidy to the Central Counties Ry. whose line is leased to the CAR, to extend its Rockland Branch, which now runs from South Indian, on the main line to Rockland, about 21 miles, a further distance of about 7 miles to Clarence creek, the subsidy being at the rate of \$1,200 per mile.

01-Apr-1900 Page 113 Interprovincial Bridge

On April 4 we were informed as follows: "The centre portions of the spans between piers 4 and 5 and between piers 5 and 6, are in place and the cantilever arm between piers 2 and 3 is being erected but owing to the expected break up of the ice, very little more will be done before it goes out. The approach on the Ontario side is being pushed and in a very short time the north approach on the Quebec side will be commenced and rushed to completion. (Feb., pg.

01-Apr-1900 Page 115 Maniwaki

The extension of this line from Gracefield to Maniwaki will be proceeded with this season. It is said stations will be established at Blue Sea Lake, Bouchette and Maniwaki. (Mar. pg. 42.)

01-Apr-1900 Page 115 New York Central

Materials are being placed in position preparatory to the resumption of work on the bridges over the St. Lawrence at Cornwall. A strong effort will be made to have the structure completed and through traffic between the terminal points of the road established by July 1. (Feb. pg.43.)

01-Apr-1900 Page 115 Waltham

When this Co.'s bill authorizing it to build from or near Quyon or Shawville to Pembroke came before the Railway Committee of the House of Commons recently objection was taken to granting the power unless the Co. would agree to extend its main line from its present terminus at Waltham to Ferguson's Point. It was agreed that this extension should be made within 2 years after the line reaches Pembroke or in default the charter to Ferguson's Point to be forfeited. (Dec. '99, pg. 359.)

01-Apr-1900 Page 117 New York Central

The US Court at New York City has appointed H.W. Gays Receiver of the NY&O RR. Owing to the delay experienced in reconstructing the bridge over the St. Lawrence River at Cornwall, the NY&O was not in financial condition to carry the interest charge that was accumulating on its bonded indebtedness and at the same time take care of the cost of reconstructing its road between Moira and Tupper Lake. the reconstructing of the bridge will be completed during the coming summer and the reconstructing of the railway will be prosecuted under receivership. The appointing of a receiver for the NY&O has no effect upon the O&NY, the latter being a separate and distinct organization and is the Canadian road over which the NY&O will reach Ottawa on completion of the Cornwall bridge.

01-May-1900 Page 137 Ottawa Terminal

Four cars are being turned out daily at the Canada Atlantic's Ottawa shops.

01-May-1900 Page 137 Maniwaki

The Ottawa and Gatineau Ry. is said to have ordered four cars for excursion purposes.

01-May-1900 Page 141 Prescott

The disastrous Hull-Ottawa fire on Apr. 26-27 completely destroyed the Co.'s Union Station, freight sheds etc. causing a loss on buildings of \$40,000. The Co. also lost 175 freight cars valued at \$130,000 and freight valued at \$30,000. The illustration here gives all that was left of the buildings.

Manager Tait, when in Ottawa a few days after the fire, said, in regard to rebuilding:

"The proposed buildings will depend altogether on the assurances given the Company by the city that it will be reasonably protected from fires. The Co. does not propose erecting costly buildings if they are to be surrounded by lumber piles and wooden shanties. If reasonable protection is guaranteed the Co. is prepared to go ahead immediately with the erection of a station which will be a credit to the city and quite in keeping with the policy of the CPR in building magnificent stations at all important centres. Arrangements have been made so that the station can be located close to the heart of the city. The freight sheds will be 3 or 4 times the size of those destroyed and will be constructed with a view to the ornate in architectural design."

General Superintendent Spencer has since shown the plans for the proposed new station, yard etc. They provide for a building 250 x 50 ft. and 3 stories high. In style it will be similar to Place Viger station in Montreal. There are two plans for the building, one of brick and stone and the other of stone. The 1st floor will be devoted to general waiting room, ladies waiting room, dining hall, restaurant, baggage, etc. and the 2nd to offices. Behind the station will be six covered ways ranging from 540 to 800 ft. and giving accommodation to 10 tracks. The passenger tracks will be entirely separate from the freight tracks, the latter coming in on what is now the main line.

01-May-1900 Page 143 Hammond

The subsidy granted at the recent session of the Ontario Legislature to this Co. at the rate of \$1,200 per mile for about 7 miles between Rockland and Clarence Creek is not for a further extension, as a line is already constructed between the two points mentioned and is leased to the CAR, with the rest of the line from South Indian and is operated as the CAR Rockland Branch.

01-May-1900 Page 143 Ottawa Terminal

The Co. will probably erect a paint shop in connection with its buildings at Ottawa East. The proposed structure will be about 300 x 70 ft. In addition to the painting department it will contain room for construction purposes and will materially add to the car building facilities of the road. It is likely that the shops at Elgin Street will be discarded in the near future in order that all manufacturing buildings be adjacent to each other.

01-May-1900 Page 144 New York Central

A recent press item stated that the car shops will be removed from Santa Clara NY. to Ottawa in a few months. We were officially informed on May 11 that the matter had not been decided and possibly would not be for a month or so thereafter.

01-May-1900 Page 147 Hull Electric

A special meeting has been called to confirm agreements with the Deschenes and the Ottawa Electric companies. It is said the Hull Co. will absorb the Deschenes Co. or in the event of the two companies remaining separate, the Hull Co. is to have equal privileges in using the Deschenes water power for the purpose of generating electrical power. The personnel of the two companies is practically the same and the amalgamation, if effected, will be settled for by the Hull Co. issuing paid up shares to the Deschenes Co. in return for the water power. As to the agreement with the Ottawa Electric Co. it is said that litigation as to rights to operate in Hull are to cease, and that a definite understanding has been reached as to the basis of future operations.

01-May-1900 Page 148 Ottawa Electric

The Co. came out of the recent Hull-Ottawa fire in very good shape. The Co.'s old power house was destroyed, but the new power house, in which a 2,000 h.p. generator had just been installed, received only slight damage to the roof. The generator, itself, was uninjured and is in full operation. The Co.'s service was interrupted for only 3 or 4 hours. The cars were in operation the evening of the day of the fire. In the burned district the only machinery moving or able to move on the day after the fire was that in the Electric Co.'s new power house and two power houses of the Ottawa Electric Light Co. It is likely that the Electric Ry. will duplicate its present power house on the site of the old power house.

01-May-1900 Page 151 Chalk River

J.W. Tierney, CPR agent at Amprior, died May 4 of smallpox.

01-Jun-1900 Page 165 Belleville

Wm. King committed suicide at Perth May 28 by hanging himself in his stable. He was formerly CPR freight agent.

01-Jun-1900 Page 167 Maniwaki

The Ottawa and Gatineau Ry. is in the market for four 1st class passenger coaches, 1 baggage car and 25 box and flat cars. The rumour that the Co. had ordered four cars for excursion service mentioned in our last issue was incorrect. The allied line, the Pontiac Pacific Junction, is also in the market for one 1st class passenger coach and 15 box and platform cars. These lines lost 13 cars in the recent Hull-Ottawa fire.

01-Jun-1900 Page 167 Ottawa Terminal

The diminution in the supply of lumber occasioned by the recent Hull-Ottawa fire interfered considerably with the work at the Canada Atlantic car shops, where operations were temporarily suspended. The employees, however, were not thrown out of work, but have since been engaged in equipping cars with air brakes and patent draw-bars. About 2,000 cars have thus to be equipped and considerable time will be necessary to do the work. By the time it is completed other operations will have resumed in the shops.

01-Jun-1900 Page 169 Article

Engineering Records in the Railway Operating Department by C.E. Cartwright, M. Can. Soc. C.E.

01-Jun-1900 Page 173 Prescott

Ottawa Union station and yards. Excavation work was commenced May 15 for the erection of freight sheds to replace those recently burned. They will be on stone foundations and made as fireproof as possible. The largest building will be 300 x 40 ft. and the second one 250 x 50 ft. Both will be finished with flat gravel roofs. The contract for the masonry has been let to T. Tomkins of Brockville and the frame work will be done by the Company. An outlay of \$25,000 will be made on the sheds. It is said the station will be built after the style of the Place Viger Station in Montreal. It will be a handsome structure, facing on Broad Street, and about 600 ft. north of the burned buildings. It will be 289 ft. in length and stone is to be used entirely in the construction. On the second floor the divisional offices will be situated. The cost is estimated at \$35,000. The train shed is to be between 645 and 800 ft in length. Ten tracks will run into it, giving ample accommodation for the passenger traffic. Plans have been drawn for the enlargement and rearrangement of the yards. The land recently acquired consists of about ten acres between the aqueduct and Richmond Road and the water front. On it 20 tracks will be laid giving greater facility for the marshalling and storage of trains. On the completion of this work the passenger and freight yards will be entirely separate. The passenger yard is to be fitted with 10 more tracks, giving provision for the making up and despatching of trains with a marked saving of time. There will also be ample accommodation for the storage of passenger cars. A line will be built from the main line near the Mechanicsville crossing, connecting with the Prescott line. This will form a Y and greatly facilitate the handling of trains entering and leaving the new station. (May, pg. 140.)

01-Jun-1900 Page 173 Ottawa Connecting Line

It is said that in consequence of the heavy loss sustained by the Co. in the recent Hull-Ottawa fire it is not likely that the project to build a line across the city to connect the Co.'s present union station, near Chaudiere Falls, with the central station near the canal basin, will be gone on with this year. (April, pg. 110.)

01-Jun-1900 Page 174 Ottawa Terminal

A building has recently been erected near the roundhouse in Ottawa for the employees, comprising reading, smoking and dining rooms and baths. The Co. is negotiating with the Ottawa city council in reference to building a subway under the tracks at Elgin Street yard.

01-Jun-1900 Page 175 Interprovincial Bridge

On May 28 we were officially informed as follows: Work is progressing very satisfactorily. The iron work is practically completed on two truss spans on the Quebec side of the river, also the south anchor arm of the cantilever with the exception of the waggon road bracketing at side of same, some of the riveting and diagonal bracing. Owing to high water, they were obliged to block this span on the piers, but are now letting it down and expect to get it in place in a couple of days. (This has since been done). There has also been several hundred feet of trestle laid on the Hull side. We are pushing the south approach to completion, including work on a very heavy dry masonry retaining wall and an undercrossing on the road for vehicular traffic. We are also engaged in cutting through the abutment of Sapper's Bridge, a rather interesting piece of work, as it was built in 1837 when Co. By first reached Ottawa. The total thickness of the abutment is 24 ft., the outside walls in some places being only 2 ft. thick, apparently laid in water line, which is now about the consistency of sand. The filling between the walls is composed of earth and some small broken stone. The stone is in fairly good condition with the exception of about 2 ins. on the outside, which the weather has had a chance to work at. (April, pg. 113).

01-Jun-1900 Page 175 Montreal and Ottawa

Montreal and Ottawa Ry. An Act respecting this Co. assented to by the Governor General, May 7, extends the time for the completion of the line for 4 years from the passing of the Act. This Co.'s line, already built from Vaudreuil to Ottawa, and from Rigaud to Pointe Fortune, is leased to the CPR. The line yet to be completed is from Pointe Fortune towards Hawkesbury.

Pontiac Pacific Junction Ry. An Act respecting this Co. assented to by the Governor General, May 7, empowers the Co. to construct and operate a railway from its present line, in or near Shawville across the Ottawa River to Pembroke. So soon as this line is completed to Pembroke the Co. is to proceed with the construction of its line from its present terminus at Waltham to or near Ferguson's Falls. (April, pg. 115).

Reports of the progress of the work on this bridge, now nearing completion, are given regularly in our Railway development department and description on the structure will be of interest. It will connect Ottawa with Hull and will have a total length of 2,286.75 feet between abutments. It is being built entirely of mild steel and consists of pin connected truss spans over the river and a long plate girder approach viaduct at the north end, besides 2 short girder spans over the steep rocky bank between the end pier and the abutment at the south or Ottawa end.

The most prominent feature of the superstructure is the cantilever portion, which is 1,053.75 ft. long between anchorages, with a clear span of 545 ft. between centre piers. The anchor arms are each 247 ft. long, the channel arms each 123.5 ft. and the suspended centre span 308.75 ft. The sub panels are in uniform units of 30 ft 10½ ins. The greatest depth of truss is 90 ft. centres, and the depth of the centre span is 45 ft. The trusses are in vertical planes 24 ft. apart throughout the whole structure, the outlines of which are shown in the general elevation. The roadway platform is 65 ft. 2 ins. wide and is designed for a single track to accommodate the Ottawa and Gatineau and the Pontiac Pacific Junction Railways, 2 electric car tracks, 2 carriageways, and 2 sidewalks. On the north approach the roadway is at a grade of 0.238% and is a deck platform except at the 60 ft. and 67 ft. street crossings, which are through plate girder spans. All the main spans are through truss spans with a horizontal roadway platform, 7 ft. 2 ins. above the centres of the horizontal bottom chords and 34 ft. 9 ins. above the tops of the channel piers.

The piers are built of masonry down to a point below low water where they rest on concrete footing carried to bed rock. Piers 4 and 5 were built through ice 30 ins. thick, in shallow water, on rock bottom so level that the cribs were sunk with their lower course of timbers hewed to fit the smooth surface, as shown in the elevation of the south anchor pier. The north anchor pier is taller and has a different type of crib, which was sunk through sawdust deposit. The stone masonry of all the channel piers corresponds to that in pier 4. Pier 1 was built without any crib, the masonry being laid at low water directly on the blasted rock bottom. Piers 2 and 3 were built in much deeper water and their concrete footings were constructed inside of very tall cribs which were sunk by dredging through 20 or 30 ft. of sawdust, waterlogged timber and other material difficult to remove. In some places between the piers this deposit was 60 ft. thick, but the piers were located so as to penetrate it in its thinnest places. The crib for pier 4 was essentially like that for pier 2 which is shown in plan and cross section. Its walls were solid courses of green 12 x 12 in. hemlock timber slightly battered upstream and on the long sides and braced by 4 cross beams tied into both sides at every fourth course. These side pieces were dovetailed between adjacent wall courses and projected about 3 ft. beyond them on each side to receive the planking of pockets which were filled with stone ballast to sink the crib. The 8 lower courses were each successively offset 4 ins. so as to extend the base of the crib to 29 x 40 ft. exclusive of the cutwater.

The lower part of the crib was built on shore. After it was launched, vertical 3 x 12 in. planks were spiked on outside, projecting below the bottom course to conform to the profile of the bottom previously obtained by soundings. The crib was floated with the lower four courses submerged when the vertical sheathing was spiked on, covering the sides to the 6th course. In order to work at the sheathing, a raft was built inside the crib and the edge of the latter was pried up from it with long levers so as to cant the crib over far enough to allow the spiking to be done above the surface of the water. Cribs 2 and 3 were located by the intersection of the bridge axis with transit lines from a fixed point on one shore to different points on the opposite shore.

For sinking the cribs 2 special scows were provided 80 ft. long, 20 ft. wide 5½ ft. deep and curved at each end. The bottom and deck of each scow was made of 2 in. caulked transverse planks extending across its full width and spiked to the top and bottom chords by 4 longitudinal intermediate trusses. The sides were made of heavy planed timber, butt jointed and bolted to inside vertical posts with cover splices and the joints of the top and bottom courses. The longitudinal trusses were intersected by 3 solid transverse portions or bulkheads, which divided the scow into 4 watertight compartments and contributed to its stiffness. The scows were placed parallel to each other and connected by 2 queen-post combination trusses about 10 ft. deep and 50 ft. long, which were bolted firmly across their decks so as to leave a rectangular 30 x 60 ft. well between them and the scows, in which the crib was suspended by four 2 in. screw rods, by which its descent was regulated. The scows were anchored in a 3 mile current, to the adjacent piers, when these were available, and by Chinese anchors, and the cribs were also anchored by up and downstream diverging lines, which were also attached to Chinese anchors.

As the cribs were lowered, their ballast pockets were filled with broken stone, shoveled in from the decks of the scows, and their sides were built up with additional timber courses until they were landed on the bottom. Slabs as much as 30 ft. long were found bedded in the sawdust and it was excavated slowly and with difficulty by a 1½ yard clam-shell dredge bucket which removed about 150 yds. a day. The material was so stiff that the sides of the excavation stood vertical and the portions raised to the surface were tough coherent masses. Planks were laid across the tops of the cribs and they were loaded with rails and other temporary weights piles on to sink them. At pier 2 the water was 40 ft. deep and the sawdust was 30 ft. deep and at pier 3 the sawdust was about 20 ft. deep.

The bottoms of the excavations inside the piers were cleaned by divers, who leveled off the irregularities and guided diamond drills, with which holes 12 ins. deep were made. These were charged with dynamite and the worst irregularities of the rock bottom blasted off. A maximum depth of 72 ft. below low water level was thus reached. The crib was filled with 1:1:3½ Portland cement concrete made with 2½ in. broken stone. The concrete was made in a horizontal mixing machine and deposited by a ½ yard bucket with double flap doors on the bottom, which opened downward and allowed the concrete to remain on the bottom when the bucket was hoisted. Over 100 bucketfuls were deposited in water 70 ft. deep in one day of 10 hours. At first the concrete mixer was set on the deck of the scow but after about 1,000 yards had been deposited, filling the crib to a depth of about 25 ft., the work on it was stopped on account of fear caused by the collapse of the concrete pier of the Cornwall bridge. It was not resumed until April 1899 when the mixing machine was set up on shore and the concrete mixed with heated sand and water and taken in sleighs across the ice to the crib.

The contractors were also directed to warm the interior of the crib which was filled with water circulating freely from the river. They accordingly established a 10 h.p. boiler on the deck of the scow and discharged live steam from it into the water. The crib was filled with concrete up to 18 ins. of low water mark; a tight coffer dam was then built on top of it, pumped out and the stone masonry laid in it. After the concreting was completed, the Government required a test boring to be made through it to bed rock with a diamond drill. A 3 in. bit was drilled down to within a few feet of the bottom, the hole cased and a 2 in. hole drilled the remainder of the distance. A core was recovered from the whole depth of the hole, which was in every way satisfactory, showing that the concrete was well set though still green. One diamond-drill hole was bored nearly to the bottom of the concrete and a second one was bored entirely through it and into the bed rock. The core was recovered in short pieces less than 12 ins. long and did not, of course, measure up equivalent to the length of the hole, but did give data of the condition of the mass at all depths. About 4 months were required for the drilling of both holes. To test the efficiency of the method of depositing the concrete, a bucket full of it was lowered to the bottom of the crib, then drawn up to the surface, again lowered a little, dumped in a submerged box and allowed to set there. When it was examined it was strong and sound, with no evidence of washing or deterioration by the movement through the water.

The principal cross-sections of the cantilever spans are given in diagrams off transverse vertical planes lettered to correspond with the references on the general elevation. The sway bracing consists in general of heavy upper cross struts and multiple intersection diagonal angles, with a light bottom cross strut or with no lower cross strut at all. Where the roadway is elevated the most above the lower chord, there is transverse diagonal bracing below the floor beams. At the anchor ends of the cantilevers, the end lower chord pins are attached at the middle of the floor beam with short diagonal braces. The under side of this strut has a projection which slides in a longitudinal seat in a casting bolted to the pier masonry, so as to allow for temperature movements of the truss and to hold it securely against any lateral displacement. The main lateral system is that in the plane of the floorbeam lower flanges, where each panel between the planes of the trusses is braced by struts made up of 4 angles riveted together back to back and riveted to connection plates on the bottoms of the

floor beams. Besides these the alternate panels included between the projecting ends of the floor beams outside the trusses and the stringers are X-braced with single angles. There is X-bracing of pairs of angles in every panel of the top chords except in the second panel each side of the main posts of the trusses. The diagonals are complemented by the top struts of the sway-bracing systems and by a continuous centre longitudinal strut running through every panel.

In order to simplify the supports and save room on top of the masonry, the ends of the adjacent bottom chords of the cantilever and the 247 ft. river span are to be supported by single pedestals common to both spans on top of pier 4. The essential features and general arrangement are shown in an elevation made from the accepted study of the pedestal. A 4 x 6 ft. grillage of 10 in. longitudinal I beams with top and bottom plates, sets on the masonry and receives 2 nests of rollers. Between these there is a space left for the steel loops which engage the end pin of the cantilever span above and pass down through the pier well to connect with the anchorage platform built into the masonry. Above the rollers is a second set of grillage made of two sets of 8 in. transverse I beams with very heavy top and bottom plates, which support a tall pedestal with two pins. The lower one receives the anchor bars and the cantilever truss members; the upper one is about 2 ft. above it in the same vertical plane, and receives the members of the short truss and the pedestals of the pier floorbeam. At the south end of the cantilever span the pedestal on pier one receives only the anchor-arm truss and is anchored by 6 in. vertical eye bars. The grillage is composed of eight 15 in. longitudinal I beams 4½ ft. long, and the pedestal is seated on the rollers without the interposition of an upper grillage.

01-Jul-1900 Page 202 New York Central

The Ottawa & New York has two trains turned out from its shops on the US side some months ago that will be put into service as soon as the bridge at Cornwall is completed.

01-Aug-1900 Page 232 Ottawa Connecting Line

Although nothing definite is being done about the construction of the proposed line across the city to connect the Co.'s union station, near the Chaudiere Falls, with the central station near the canal basin, it is said the matter is not being lost sight of, and that negotiations are going on with a view to acquiring land on the south side of Wellington Street and along Division Street. For part of the way the line will run parallel with the Canada Atlantic tracks. It will be probable that a subway or an overhead crossing will be put in at Bank Street. (June, pg. 173.)

01-Aug-1900 Page 232 Chalk River

Carleton Place shops. We are officially informed that there is no truth in the report which recently appeared in some of the daily papers stating that the Co.'s shops are to be moved from Carleton Place to Ottawa.

01-Aug-1900 Page 232 Prescott

Ottawa Station. The building which is being erected to replace the station burned a few months ago will face on Broad Street and will be about 600 yards north of the site of the old building. It will be of stone and brick. The contractors are Lyons and White, of Ottawa and the contract price is said to be \$35,000. The aqueduct is being bridged to make room for the additional tracks to reach the station. (June, pg. 173).

01-Aug-1900 Page 239 Interprovincial Bridge

Work is proceeding on the superstructure and it is hoped to have the bridge completed in October or November. (Jly., pg. 195).

The Dominion Parliament last session voted \$100,000 in additions to \$112,000 previously granted, towards the construction of this bridge, on condition that it provide suitable facilities, to the satisfaction of the Minister of Railways, for vehicular and foot traffic the same as upon a public highway.

01-Aug-1900 Page 240 Kingston (CP)

The Dominion Parliament, last session, voted \$38,400 towards constructing a branch of this line for 12 miles to iron mines in Bedford township.

01-Aug-1900 Page 241 New York Central

A Cornwall despatch of Aug. 3 said: it is expected the work on the bridges across the north and south channels of the St. Lawrence at Cornwall will be completed and the structures ready for traffic by Sept. 15. The shore span in the south channel, which was swung about two weeks ago, is all riveted up, the false work and piles removed and the water under it clear. The strength of the current rendered it inadvisable to use wooden piles to support the false work of the centre span and 24 steel piles were secured. They are 50 to 60 ft. long, of 15 in. channel steel, connected by lattice work and most of them have been driven. The erection of the false work is close behind the pile driving and early next week will be ready for the erection of the middle span. In the north channel the foundation of pier 8 at the toe of the canal bank is finished and 8 courses of masonry laid. The steel caisson around pier 7 is resting on the rip-rap at the bottom of the river. This material, which was dumped in after the accident two years ago, has been mostly removed, and the caisson rests about on the original bed of the river. The entire steel work is under water, only a timber extension, which will afterwards be removed, showing. The caisson will be filled with concrete and laid to the original foundation with wire ropes embedded in concrete.

The Dominion Parliament last session voted \$90,000 towards the construction of the Canadian portion of the Cornwall bridge.

After several months of negotiations the O&NY is said to have concluded the purchase of property for its freight terminus in Ottawa. Owing to the fact that approaches could not be secured to the terminal property originally purchased adjacent to the Central station, it became necessary to secure a new location. The Co. will now proceed with the erection of such buildings as may be necessary for the carrying on of its freight traffic. It is expected that the car shops will be erected within the city limits between now and autumn when the works will be removed from Santa Clara, NY.

01-Aug-1900 Page 241 Ottawa, Brockville and St. Lawrence

Ottawa, Brockville and St. Lawrence. The Dominion Parliament last session incorporated a railway company under this name with power to build from or near Ottawa through the counties of Carleton, Grenville and Leeds, to or near Brockville, but not to build or operate a street railway in Ottawa or Hintonburg or to build or operate a railway within one mile of the Ottawa Electric Railway at Britannia. The Co. is given powers to generate and distribute electrical power and energy and to operate a ferry across the St. Lawrence to Morristown, NY. Gives list of incorporators.

01-Sep-1900 Page 267 Kingston (CP)

J.D. Flower, of New York, who dies at Prout's Neck, Me. in Aug., from paralysis, was Vice-President of the Kingston and Pembroke Ry.

01-Sep-1900 Page 269 Montreal and Ottawa

P. Houston has been appointed Roadmaster M&O Section with headquarters in Ottawa.

01-Sep-1900 Page 274 New York Central

The O&NY is about to purchase 2 freight locomotives, but not any passenger locomotives, as erroneously stated in some papers.

01-Oct-1900 Page 299 New York Central

The completion of the bridge over the St. Lawrence River between Cornwall and Hogansburg enables the O&NY and the NY&O to be operated as one line. For the purposes of operating and for the convenience of transacting business, the line will be known as the New York and Ottawa. The following officers with offices at Ottawa will have charge: G.P. Colpas, Auditor; G.H. Phillips, General Freight and Passenger Agent; G.A. Brown, Assistant General Freight Agent; H.K. Gays, Assistant General Passenger Agent; M.G. De Shaw, Superintendent; M. Keefe, Roadmaster; M. Goodrich, Master Mechanic, office Santa Clara.

01-Oct-1900 Page 300 Belleville

An order was recently placed for the construction of the following equipment at the CPR shops at Perth. 138 boxcars, 100 gondola cars with hopper bottoms, 20 refrigerator cars, 100 ore cars for the Kootenay District. All of the above will be of 60,000 lbs. capacity.

01-Oct-1900 Page 300 New York Central

The NY&O equipment consists of 8 locomotives, 12 passenger cars, 1 baggage car, 3 combination car, 320 freight cars and 4 cabooses. As the Co. will not have through New York service it has not been found necessary to purchase the two locomotives mentioned in our last issue.

01-Oct-1900 Page 317 New York Central

The annual meeting was held in Ottawa Sept. 25. It is said that 765 passengers were carried on the line between Ottawa and Cornwall during the year and that the amount of freight carried was 30,524 tons.

The gross earnings of the road during the year are said to have totalled \$63,890.04. The expenditure is said to have been about equal to that amount, but the receipts cover all expenses outside of interest. The following were elected directors: H.W. Gays, Ottawa, G.F. Peabody, G.B. Moffat, A.N. White jr., A. Nicholas, B. Moffat, S. Trask and H.S. Snow, NY.

01-Nov-1900 Page 328 Winchester

Smiths Falls divisional offices. The staff have moved into the new quarters recently completed. The building is a two story frame one on stone foundations 36 x 55 ft. with bay windows. There is a passageway through the centre of the building with rooms on each side. On the ground floor are conductors room, B & B Masters office, Roadmasters clerk's office, Roadmaster's office, Trainmaster's office, telegraph office and booking room. On the first floor are Superintendent's office, Chief Despatcher, despatchers, stores, Superintendent's clerks, Resident Engineer, draughting room. There is a lavatory on the ground floor. The building is heated by steam. (Jan pg. 6.)

01-Nov-1900 Page 328 Ottawa Connecting Line

Nothing is likely to be done this year about the construction of the proposed line to connect the Co.'s union station near the Chaudiere Falls with the central station near the canal basin, but it is said to be probable that construction will be gone on with next year. It is said options on property that are necessary have been secured. (Aug. pg. 232.)

01-Nov-1900 Page 328 Prescott

Ottawa Union Station is rapidly nearing completion and it is expected it will be ready by December 1. The design may be described as being of the modern American style of architecture, savouring considerably of the romanesque. The building has a frontage of 136 ft. and is 40 ft. deep. A wing on the east side will have a frontage of 35 ft. and will be 80 ft. deep. The station will be almost twice as large as the old one which had a frontage of about 50 ft. The building will have a high pitch roof of Rockland slate. Its foundations are on solid rock 12 ft. from the surface. For 3½ ft above the foundations the walls are of Scotch granite and above the masonry is white Scotch fire brick. The windows are all large and fitted with English sashes. The central room will be a general waiting room 32 x 40 ft. It will also contain a ticket and telegraph office. To the right of this room will be a first class waiting room for women. Between the two a corridor will extend to the north end of the building, at which will be situated the restaurant, kitchen and pantry. To the left of the main waiting room will be the second class waiting room. At the extreme left will be the 80 ft. wing, which is to be utilized as a general baggage room and as the office and store room of the Dominion Express Co. Upstairs will be situated the offices of the Superintendent and staff, train despatchers, Trainmaster, Roadmaster, Building and Bridge Master, and three spare offices. The building was commenced on July 20 and is expected to cost about \$25,000. The station is situated 50 ft. back from the road between the aqueduct and Richmond Road. Ample space will be allowed for vehicles in front of the station. Six tracks for passenger trains have been constructed to connect with the new station. Two platforms with umbrella roofs, 700 ft. long, have been built between these tracks. The platform at the rear of the station is also covered by an umbrella roof. The old station site and tracks will be used as an extensive freight yard. The new station is about 5 feet above the former one and this difference in level has been filled in and graded. E. Maxwell, Montreal is the architect. An illustration of this station is given on page 320. (Aug. pg. 232.)

01-Nov-1900 Page 328 Carleton Place

An Ottawa paper recently stated very positively that the Co. was preparing to erect extensive workshops on its property at Westboro to employ 1,500 men, so that a considerable amount of the work which is at present done at Carleton Jct. might be done at Westboro and that the electrical power at the Metropolitan Company, conveniently located at Britannia would be used. We are officially informed that there is no truth whatsoever in the rumour.

01-Nov-1900          Page 331                  New York Central

M. Goodrich, heretofore general Foreman, has been appointed Master Mechanic with headquarters in Ottawa.

01-Nov-1900          Page 343                  Montreal and Ottawa

Fast running on the CPR. A fast run was made Nov. 12 with a special train carrying Lord Strathcona from Montreal to Ottawa. It left Windsor Street station at 8.37 a.m. and reached Ottawa at 10.27 a.m. a distance of 111.4 miles in 110 minutes. At least ten minutes should be deducted from this, however, for slow running through Windsor Street station yard at Montreal and the Central station yard at Ottawa, and for reducing speed at four interlocked grade crossings and at St. Annes and Vaudreuil to receive and deliver electric train staff. The train consisted of Atlantic type locomotive 210 with Driver J. Smith at the throttle, one coach and the private car Metapedia, was in charge of Conductor A. Chapman.

01-Dec-1900          Page 370                  Renfrew

A.E. Campbell, formerly station agent at Ayleen Lake, has been appointed station agent at Kinburn, vice W.J. Duberville, relieved.