

Bulletin

Vol. 27, No. 46

November 15, 1972

NEW HOPE FOR HEROIN ADDICTS

As a result of financial assistance provided by the National Research Council of Canada to a Candiac, Quebec, firm, heroin addicts may find the path back to normal life much smoother. The company, Bristol Laboratories of Canada, has produced a chemical, never before synthesized. Experiments with animals have shown that the chemical - a new narcotic antagonist - combats and counteracts the effects of heroin.

THE NEW ANTAGONIST

Bristol's new antagonist is called Levo BC-2605 (the 2605th compound synthesized at Bristol Laboratories). It is a potent, long-acting antagonist with very quick response. Laboratory investigations have demonstrated that very low doses of BC-2605 eliminated the effect of morphine completely - and they did so in less than 90 seconds. Five milligrams of morphine can be blocked by two-tenths of a milligram of this antagonist. One-half a milligram is effective for 24 hours.

Chemists and biochemists are still trying to determine how antagonists work.

"In our case," explains Dr. Yvon Perron, head of research at Bristol, "the antagonist may occupy the same receptor sites in the cell as the opiate - displacing the latter if it has to - and then blocks off these sites from the opiate. It does this quickly in a matter of one or two minutes. An important point to remember is that the cell membrane function appears to be returned to normal by the antagonist."

NO ADVERSE EFFECTS

In addition to being short-lived and weak, several of the early antagonists (the first was synthesized in 1914) had undesirable side-effects. Nalorphine (1940) counteracted most of the actions of narcotics in a satisfactory manner but it produced unpleasant feelings of disorientation and hallucinations. The result was that use of nalorphine was restricted to treatment of narcotic overdosage. More recent antagonists were even more potent than nalorphine but their side-effects were also more intense.

No such problem exists with BC-2605. Numerous

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laboratory tests confirm that, despite its potency and long activity, BC-2605 is free from harmful side-effects.

One of the best narcotic antagonists at present is naloxone, which was first considered extraordinary. One part of the compound was able to block the effects of 100 parts of heroin. It produced no hallucinations, even at very high doses. In fact, it was even able to counteract and reverse hallucinations produced by all the other narcotic antagonists. Naloxone abolished respiratory depression, nausea, constipation, convulsions and all other effects produced by narcotics and narcotic antagonists. It was found to be a "pure" antagonist with no potential for addiction.

COMPARISON TO NALOXONE

Naloxone would appear to be an ideal narcotic antagonist, except that it is short-acting (its blocking effects are usually gone after two or three hours). In order to protect an addict from heroin challenge for 24 hours, huge oral doses of one to three grams a day are required. At these dose levels, naloxone would be extremely expensive and in short supply.

BC-2605, on the other hand, is long-acting and requires only low dosage to work effectively. It is synthesized in nine steps from anisole, a relatively cheap, easily accessible starting material. This is in marked contrast to naloxone, which is made from thebaine, a rare alkaloid from the extract of opium. This constitutes another severe disadvantage. As Dr. Perron points out: "The more naloxone you want, the more opium you need to make available, but the more opium, the more morphine and the greater the possibility for heroin. You defeat the purpose."

BC-2605's structure was known to chemists for over a decade as 14-hydroxy cyclophane, but there was no way of synthesizing the complex molecule until Bristol did it in March 1971. The synthesis was based on an idea from Professor Bernard Belleau, of McGill University, Montreal, and the consulting head of research at Bristol. It was accomplished by Dr. Ivo Monkovic, senior research chemist at Bristol, assisted by Henry Wong, a research scientist at Bristol.

Chemists, biochemists and pharmacologists in specialized laboratories are now studying the manufacture of tiny bio-degradable sacs which would be filled with BC-2605 and would disintegrate in the body, slowly releasing the antagonist. Calculations show that 45 milligrams of the antagonist should furnish protection for three months if released slowly enough. In effect, this would be a vaccine against addiction.

The antagonist will also provide a check on those who seek methadone, claiming they are heroin addicts. An addict will show withdrawal symptoms when the antagonist is administered, whereas the non-addict will undergo no change.

Death is not kind to the heroin addict. Symptoms of an overdose of the pure opiate are coma, shock, and ultimately, respiratory arrest and death. The

impure opiate or contaminated instruments of the street-user are often at the root of hepatitis, tetanus, heart and lung abnormalities which, without adequate medical care, spell death. For some addicts, sudden collapse and death have been reported following a single intravenous injection - owing, probably, to contaminants and lethal impurities in the drug sample or perhaps to an overdose of heroin that resulted from the erratic dilution and make-up of the drugs obtained from the "black market".

Death is not kind either to the addict's newborn child. Babies born of dependent mothers also are physically dependent on the drug and may die if withdrawal symptoms are not recognized and treated soon after birth.

Thanks to Bristol's BC-2605 the future for the heroin addict looks a little brighter.

TRADE WITH BRITAIN

When Britain has joined the European Economic Community Canada will be Britain's second-largest export market outside the EEC and its free-trade associates, British Trade Minister Michael Noole stated recently.

Addressing a meeting of the Canada-Britain Chamber of Commerce in London, Mr. Noble said that British exports to Canada had grown "spectacularly" during the past two or three years: "L288 million in 1970, L349 million in 1971 and already L273 million this year - a rate which, if continued, would give a total of L346 million." According to Mr. Noole, Canada was Britain's tenth market in 1970, the ninth in 1971 and, so far, the eighth in 1972.

Mr. Noole continued:

"All this indicates clearly the importance of each market to the other. Canada is our eighth market, we are Canada's second. We are one of Canada's best markets for manufactured goods, while raw materials - Canada's historic strength and likely to remain so for the foreseeable future, however great may be her industrial development - will be the key to the expansion of the industries of the Community, as much as any in the world.

* * * * *

"We look to our membership of the Community and all that follows from the establishment of a home market larger than that of the U.S.A. to stimulate in us a rate of growth such as the Community has enjoyed. This growth will enormously enhance our dependence on foreign trade, not just with Europe but with all the countries of the world. Canada, with her vast natural resources, her high level of economic development and her rapidly-expanding economy, not to mention her close trading ties with Britain, must be particularly advantageously situated to reap the fullest benefit from the new situation just as she will be the sort of trading partner we shall need and want to have...."

FACTORY REBUILT - COMMUNITY SPIRIT TRIUMPHS



St. Joseph de Beauce factory goes up in smoke.

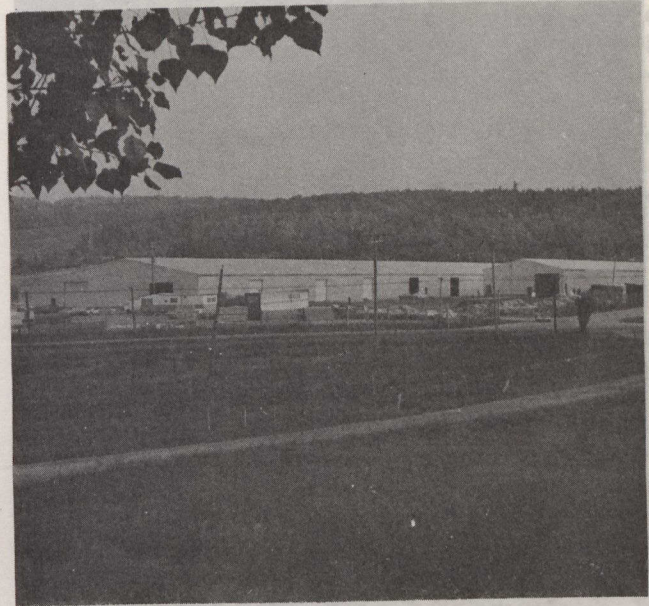
The small town of St. Joseph de Beauce some 40 miles southeast of Quebec City was recently the site of an event that will remain in the town annals for years to come.

Last September 6, a fire completely destroyed the Glendale Company mobile-home factory, which had been operating in St. Joseph since 1966 and which had expanded considerably (its turnover increased from \$1 million to \$9 million in six years), to the benefit of several of the neighbouring municipalities. The factory represented the livelihood of 238 full-time employees and indirectly affected that of more than 500 workers. Thus the conflagration was a tragedy for the entire community.

During the first few days following the catastrophe the Glendale Company received from several other towns tempting offers of premises that would have spared the company the financial burden of a lengthy reconstruction period. But such offers didn't take into account the resolution and courage of the residents of St. Joseph!

SIX MONTHS TOO LONG TO WAIT

The people of St. Joseph did not intend to lose their industry. The day after the fire, they examined the possibility of rebuilding the factory. The townspeople met with representatives of the Quebec Department of Labour to obtain permission for the 238 Glendale employees to be hired to rebuild the factory; in this way the employees could continue to draw their salaries and reconstruction could be carried out as soon as possible. However, because of regulations governing the construction industry, permission was denied, which meant that it would take at least six months to do the job.



New building was constructed entirely by voluntary work.

EVERYONE PITCHED IN

Without further delay, and through the initiative of the Association coopérative industrielle (the Industrial Co-operative Association), the mayor and a few of the citizens, a community project was launched. In 21 days and 22,500 hours of voluntary work, 3,250 residents of St. Joseph, in a rare atmosphere of trust and co-operation, rebuilt their 90,000 square-foot factory. Everyone pitched in; from 8 a.m. until midnight, the work site was a hive of activity. Full-time employees were joined by engineers, architects, lawyers, notaries, judges and teachers; everyone helped out. People came from all over to watch admiringly or encourage the workers.

DISTINGUISHED VISITORS

Governor-General Roland Michener, and Mrs. Michener visited the project and ate on the site with the volunteer workers. In a symbolic gesture, Mr. Michener climbed a ladder, hammer in hand, and nailed a board to the factory wall. The visitors said they were truly surprised by the atmosphere of co-operation that prevailed on the work-site, and that to the best of their knowledge, the project was without precedent.

A GESTURE OF GRATITUDE

As a sign of their appreciation and their gratitude to the townspeople, the company directors donated \$30,000 to the local arena committee and gave each employee a \$100 bonus and a 5 percent increase in salary over the salary rate in effect at the time of the fire.

By dint of their courage and resolution, the people of St. Joseph de Beauce rebuilt their factory



Governor-General Roland Michener lends a hand in rebuilding burnt-out factory in St. Joseph de Beauce.

and made good a financial loss of \$1,250,000. To mark the completion of the community project they staged a huge celebration, which was their way of saying: "We are returning to our normal way of life, but this experience will not be soon forgotten. Our town will never be the same; we have learned to help, know and appreciate one another."

The Glendale factory has now resumed normal production, and the first mobile home came off the assembly line after an interruption of just five weeks. What started as a tragedy is now just a happy memory.

AVALANCHE FORECASTER

Bristol Aerospace Ltd of Winnipeg has designed a \$50,000 data-acquisition system that will detect potential avalanches. Called an automatic meteorological station for avalanche forecasting, the new device should be a big help to "slide-watchers" in British Columbia.

The system consists of a master station, two sensor stations and a receiving station. The proposed test site is Rogers Pass in Glacier National Park, one of the most avalanche-prone areas in the world.

The two unmanned sensor stations — one on MacDonald Mountain, the other on Mount Fidelity — measure and telemeter wind, humidity and temperature data with either automatic or manual feedback to the master station.

Located near the Trans-Canada Highway, the master station automatically records and displays the

information, relaying it to the receiving station, ten miles away, where it is analyzed by avalanche forecasters. Looking much like a small data-processing system, the master station equipment utilizes a unique telemetering system and VHF transmission for forwarding data.

Having obtained the latest data, Canadian army gunners will then bombard the potential danger areas with howitzer shells. This "controlled-slide" method will produce premature avalanches and minimize any threat of major proportions.

Officials are hoping that, for the first time since Canadian Pacific pushed its rails through the Pass in the 1880s and the Trans-Canada Highway was completed ten years ago, they will be able to cope with the 600-inch snowfall and keep traffic moving.

The weather-monitoring device to be used in British Columbia is an application of electronic technology developed earlier at Bristol Aerospace, which employs more than 1,000 people at its Winnipeg plant.

Bristol officials believe the same kind of equipment can monitor air- and water-pollution levels, both in cities and on industrial sites, for city-traffic control and for gauging conditions such as metal fatigue in turbines.

PLANES SEEK N.B. MINERALS

The Geological Survey of Canada, a branch of the Energy, Mines and Resources federal department, is carrying out a high-sensitivity aeromagnetic survey in the Bathurst area of New Brunswick in pursuit of new mineral deposits. Costs of \$100,000 will be shared by the Federal Government and the New Brunswick Department of Natural Resources.

A second object is to evaluate, under operating conditions, the high-sensitivity technique that is still experimental in this application.

Standard-sensitivity aeromagnetic surveys have been flown in Canada since the end of the Second World War and the Geological Survey has been the largest contractor of aeromagnetic surveys in the world (averaging 290,000 line miles a year for the past decade). It conducts development work in aeromagnetic techniques to ensure that the most up-to-date techniques are used by the companies carrying out the systematic surveys. This development work has resulted in new and more sophisticated techniques that are being used in a twin-engine light aircraft belonging to the Geological Survey of Canada, which is being flown under contract in a series of test areas having a variety of geological terrains. With the successful completion of the experimental program it is intended that Canadian airborne geophysical companies will apply the high-resolution aeromagnetic method in mineral-resource programs in Canada and in foreign-aid contracts that the Geological Survey administers on behalf of the Canadian International Development Agency.

VIETNAM TRUCE SUPERVISION OFFER

The Secretary of State for External Affairs, Mr. Mitchell Sharp, issued the following statement on November 2:

Recent statements by the United States and North Vietnam have indicated the possible conclusion of a peace settlement in Vietnam in the very near future. The Prime Minister, in his statement of October 26, welcomed this development and expressed the hope of all Canadians that this conflict can be brought to an end as soon as possible.

It has been stated publicly that part of the peace settlement envisaged by the parties concerned includes the formation of new international machinery to supervise the implementation, by the parties, of some of the terms of the proposed peace settlement, and there have been speculative press reports regarding Canada's possible participation in this new machinery.

Over the past few years the Government's policy in regard to Canada's participation in any new peace supervisory arrangements in Indochina has been stated clearly on many occasions, both in public and in private. Accordingly the Government would consider favourably any request by all the parties for Canadian participation in such arrangements if, in the light of Canada's experience in this area, the proposed operation held the promise of success and it seemed likely that Canada could play a useful and effective role in it.

The parties concerned appear to have concluded that when a cease-fire goes into effect in Vietnam

there should be some form of international presence immediately on the ground to participate in such supervisory functions as may be required. To meet this situation, therefore, the Government of Canada is prepared to place at the disposal of the new international supervisory body for the initial period the Canadian delegation to the existing International Commission for Supervision and Control (ICSC) in Vietnam established by the 1954 Geneva Conference. The Canadian delegation already has offices in both Saigon and Hanoi, and would therefore be in a position to participate in the initial supervisory activities of the proposed new organization until the international conference provided for in the peace settlement. Developments at the conference would enable Canada as well as the parties concerned to determine what, if any, future role was appropriate for Canada in Vietnam in the light of the arrangements that emerged from the conference concerning the membership, the terms of reference and the operation of an international supervisory body.

If invited to the international conference, which is scheduled to convene 30 days after the signing of a cease-fire, Canada would, of course, be prepared to attend.

The Government hopes that, insofar as Canada's participation is a factor, this course of action will enable the initial cease-fire arrangements to proceed without delay, subject of course to an agreement being reached among the parties concerned.

UNDP CONTRIBUTION INCREASE

In a statement to the 1972 pledging conference of the United Nations Development Program on November 1, the Canadian representative, Dr. Saul Rae, stated Canada's intention to increase its contribution by \$1.8 million, subject to Parliamentary approval, bringing Canada's pledge for 1973 to \$19.8 million (U.S.). Canada will also, he said, contribute in 1974 an amount at least equal to the total already indicated for 1973 taking into consideration the Program's growth, and subject to the appropriation of funds by the Canadian Parliament. The latter commitment is being implemented on an interim basis pending the reaction of other donor countries.

During the next calendar year, a minimum supplemental contribution of \$500,000 will also be made by Canada, to aid in accelerating the development of the least-developed countries.

FAMILY PLANNING PLEDGE

Canada pledged, on November 2, \$2 million to the United Nations Fund for Population Activities (UNFPA). The sum is part of Canada's multilateral development assistance program for 1972-73. Can-

adian aid authorities consider family planning an important part of development programs to improve living standards in many developing countries. The UNFPA is financed by voluntary contributions from a number of UN members and undertakes family-planning projects and related research.

AIRPORTS BUSY IN 1971

Toronto International Airport led Canada's airport activity last year with 6,423,500 passengers, which compares with 6,210,000 in 1970.

Montreal was second with 5,213,500 (4,909,300) and Vancouver was third with 2,656,200 (2,524,700) passengers.

Calgary International Airport, which was in fifth place in 1970, was fourth in 1971 with 1,466,000 (1,393,500). Winnipeg, which was fourth in 1970, was fifth last year with 1,387,800 (1,410,800) passengers.

One other airport with more than 1 million passengers was Ottawa International with 1,093,900 in 1971 (1,040,800). (The figures in parentheses refer to 1970.)

AIR PIRACY PACT URGED

Canada has instructed its embassies round the world to try to persuade countries that have not yet done so to become parties to three conventions dealing with the security of civil aviation. Canadian embassies in 61 countries have been asked to approach appropriate officials in the foreign ministries of the countries concerned to register the Canadian view that it is of vital importance for these countries to become parties to the relevant conventions approved at Tokyo, The Hague and Montreal.

The Tokyo Convention, approved on September 14, 1963, provides for the return of hijacked aircraft, passengers and cargo; the Convention approved at The Hague on December 16, 1970, obliges states parties either to extradite hijackers or to submit them for prosecution; and the Montreal Convention, approved on September 23, 1971, obliges states parties either to extradite or to submit for prosecution saboteurs of aircraft or other civil aviation facilities.

FORTHCOMING TRADE FAIRS

Canada's export-sales drive will be highlighted during 1973 and 1974 by exhibits in 31 trade fairs in 11 countries, the Department of Industry, Trade and Commerce announced recently. All shows will be sponsored by the Department and the products of some 300 companies will be displayed. The list of fairs includes seven displays of apparel and textiles - two in Germany, three in Britain and two shows of women's apparel in New York.

Electrical and electronics equipment will be on show at the German Industries Fair in Hanover and at the Paris Air Show in France. Machinery products will be shown at the World Gas Exhibition in Nice, the Forest Products Machinery and Equipment Exposition at Atlanta Georgia, Hotelympia in London, and the National Restaurant Association Convention in Chicago will have exhibits of specialized Canadian equipment.

There will be displays at the Industrialized Building Exposition and Congress in Louisville, Kentucky, the Retail Jewellers' of America Convention in New York, the 3/I Show/Farm Equipment in Kansas City and the International Exhibition of Machinery Equipment and Instruments for the Timber and Woodworking Industry in Moscow.

Exhibits are planned in the Hickory Furniture Mart at Hickory, North Carolina, the Cannes International Film Festival and the International Record and Music Publishing Market also in Cannes, and INBEX in Louisville, Kentucky.

General exhibits will be mounted at the International Trade Fair in Algiers, the Budapest International Trade Fair, the Izmir International Trade Fair in Turkey and the Tel Aviv International Trade Fair.

The Fifth Annual Offshore Technology Conference in Houston, Texas will have a Canadian exhibit, and Canadian-built boats will be shown at the U.S. Sailboat Show in Annapolis, Maryland. Canada's aerospace industry will be on full display during the Paris Air Show in France, and the Japanese International Aerospace Show in Tokyo will emphasize Canada's STOL system capability.

Agriculture, fisheries and food products will be featured in a display at the National Food Services Exhibition in London and the Japanese Meat Promotion in Tokyo.

In addition to these departmentally-sponsored exhibitions, some of which are still open to companies interested in testing the export market, the Department has a program for assisting companies that seek to exhibit in trade fairs not included in the list of direct-sponsored fairs.



REMEMBRANCE DAY MOTHER

Mrs. Mary Louise McLeod, a 76-year-old Indian from the Cape Croker Reserve near Wiarton, Ontario, represented Canadian motherhood at the national Remembrance Day ceremony in Ottawa on November 11.

Mrs. McLeod lost two sons during the Second World War. Alfred Joseph McLeod, aged 29, was killed in Italy while serving with the Perth Regiment. John Joseph McLeod, aged 23, was killed while serving in the 6th Armoured Regiment in northwestern Europe.

Mrs. McLeod placed one of the six official wreaths at the National War Memorial during the ceremony.

CP ON EUROPEAN ROADS

Canadian Pacific, the world's largest privately-owned integrated transportation company, has brought into operation its own European trucking company.

Set up by CP Ships, the new company will strengthen the road-haulage element in its door-to-door container services to and from Canada and the midwestern United States. During the first phase, development will be centred on Britain.

FAMOUS RAILWAY

This latest expansion means that Canadian Pacific now owns and operates rail network extending nearly 17,000 miles throughout Canada and 4,000 miles into the U.S., road-haulage companies on both sides of the Atlantic, a fleet of five cellular-container vessels and a container port terminal at Wolfe's Cove, Quebec.

Trading as CP Transport (London) Ltd the new company is notable for the depth of research into trucking techniques within an intermodal transportation system — with particular emphasis on interface consideration. While it is "tailor-made" to European requirements, CP-Transport has the advantage of operational and administrative expertise built up over the years by Canadian Pacific's vast North American fleet of more than 1,539 trucks, 1,212 tractors and 3,567 trailers.

TRUCKING EXPERIENCE

One result of this long experience in trucking operations is to be seen in the specifications laid down for the British road fleet. To some observers, these have been considered as being quite radical by common standards. As one spokesman said: "I will be surprised if some of them don't find their way into other British fleets. This will be all to the good. We have had in mind particularly long-term economies of operation and maintenance to which the entire industry must give closer consideration if soaring distribution costs are to be contained."

CP Ships sees the establishment of its own trucking company as an essential component of the 'pipeline' concept, with a single control and a single document.

IMPORTANCE OF DRIVERS

Drivers have been carefully chosen on the basis of long-term service with the company. They wear company livery, and CP Transport emphasizes the importance attached by the company to driver requirements. They are a vital link in the chain of relations between a container company and the shippers it serves. CP Transport see them not just as good drivers but, in effect, as public relations representatives.

The CP Transport trucks, backed by the continuing use of sub-contractors, will feed the CP Ships weekly container services between Tilbury and

Liverpool and the container terminal at Wolfe's Cove owned by CP Ships. The Liverpool regional office will have its own road fleet as the service expands.

For the Atlantic crossing, the CP Ships fleet now consists entirely of cellular-container vessels. In Canada, the Canadian Pacific network of rail and road services, into which containers are fed directly from Wolfe's Cove, is geared specifically to the rapid delivery of containers to all parts of Canada and a big section of the U.S. mid-west.

TOURISTS LIKE ONTARIO

More visitors from abroad are spending more money in Canada annually, with Ontario accounting for a major share of this growing tourism market.

The number of visitors to Canada increased from 410,800 in 1966 to 535,500 in 1970, their expenditures mounting from \$110 million to \$152 million during the same period. And, in 1970, Ontario attracted 228,000, or 42.6 per cent, of all visitors to Canada.

These are some of the findings of a survey of the European tourist market carried out by the Tourism and Recreation Studies Branch of the Ontario Ministry of Industry and Tourism.

REASONS FOR TRIP

Visiting friends and relatives was the main reason given by the majority of Europeans for coming to Canada. Recreation rated second, with business purposes the third most important inducement.

The study also indicates that the average length of stay for European travellers to Canada is about 20 days. By comparison, for United States visitors, the trip to Canada is usually of shorter duration, the majority staying less than 24 hours, and of those remaining overnight the average length of stay is about six days.

In 1970, the number of European visitors to Ontario was 169,800, with expenditures of \$48 million. These visitors usually do not require commercial accommodation, the study reveals, and even those tourists of relatively modest means usually save money and plan on spending it in Canada for souvenirs and personal items. A total of \$173 spent by Europeans compares favourably with a smaller average expenditure for each U.S. visitor in Ontario.

WHERE THEY COME FROM

British tops the report's list of ten leading foreign countries in terms of visitors to Canada in 1970, with a total of 157,736. The others are: West Germany, 41,261; France, 36,915; the Netherlands, 27,996; Japan, 22,011; Italy, 18,577; Australia, 17,001; Jamaica, 11,417; Mexico, 10,682, and India, 9,428.

The study points out that the European visitor likes to travel and see as much as possible while on this side of the Ocean.

FOOTBALL AND HOCKEY NEWS AS AT NOVEMBER 12

CANADIAN FOOTBALL LEAGUE PLAYOFFS

Eastern Conference - November 11

Ottawa, 14; Montreal, 11

Western Conference - November 12

Regina, 8; Edmonton, 6

NATIONAL HOCKEY LEAGUE

Results
November 11

Montreal, 5; Los Angeles, 2.

St. Louis, 1; Toronto, 0.

NY Rangers, 7; California, 2.

Minnesota, 3; NY Islanders, 0.

Philadelphia, 3; Buffalo, 1.

Vancouver, 4; Pittsburgh, 3.

November 12

Montreal, 5; Boston, 3.

NY Rangers, 5; Los Angeles, 1.

Chicago, 5; Detroit, 1.

Buffalo, 1; Pittsburgh, 0.

Atlanta, 3; Vancouver, 1.

Philadelphia, 8; California, 3.

Eastern Division

	P	W	L	T	F	A	P
Montreal	17	12	1	4	70	31	28
NY Rangers	16	11	4	1	66	41	23
Buffalo	16	7	3	6	44	34	20
Boston	16	7	7	2	69	62	16
Detroit	14	7	6	1	47	43	15
Toronto	15	5	8	2	41	46	12
Vancouver	17	6	10	1	44	62	11
NY Islanders	13	2	10	1	29	63	5

Western Division

Philadelphia	17	9	6	2	57	53	20
Los Angeles	18	9	8	1	63	58	19
Chicago	17	8	7	2	58	51	18
Atlanta	17	7	7	3	38	52	17
Minnesota	15	7	6	2	43	38	16
Pittsburgh	17	7	9	1	55	56	15
St. Louis	14	3	6	5	34	42	11
California	16	2	10	4	42	68	8

WORLD HOCKEY ASSOCIATION

November 11

Quebec, 3; Houston, 1.

Cleveland, 4; Chicago, 1.

Alberta, 5; Los Angeles, 3.

November 12

Ottawa, 2; Philadelphia, 1.

Winnipeg, 5; Los Angeles, 2.

Cleveland, 3; Alberta, 1.

Eastern Division

Cleveland	10	3	1	57	35	21
Quebec	9	4	1	50	38	19
New England	9	4	0	58	42	18
Ottawa	7	5	1	54	53	15
New York	7	9	0	68	62	14
Philadelphia	2	12	0	38	69	4

Western Division

Alberta	9	7	1	57	57	19
Winnipeg	9	8	1	59	60	19
Los Angeles	8	7	1	53	51	17
Houston	6	7	0	39	46	12
Minnesota	5	6	1	32	37	11
Chicago	2	9	1	28	43	5