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Don Dunbar — Founding Editor

Production cut 15 percent due to drop in nickel sales

The Company announced further cutbacks in production October 29, which will reduce nickel production by about 15 per cent when fully effective early in 1972. This was in addition to a seven per cent cut in production announced in August.

The curtailment was necessitated by a sharp decline in nickel sales during 1971. The Company has been producing nickel substantially in excess of sales since the spring of this year. It had been hoped that the earlier seven per cent reduction in production, which was achieved without lay-offs would decelerate the rapid rise in inventories, but sales have continued to be disappointing. Total inventories at the close of the third quarter were \$425 million or \$139 million higher than at the end of 1970.

The cutback in production has required a reduced work force. This is being accomplished primarily through attrition, but also has necessitated the lay-off of approximately 470 hourly-paid and staff persons in Ontario and Manitoba. The majority of these are at the Company's Port Colborne refinery in Ontario.

In addition some 770 hourly-rated and staff people in the Sudbury district are being transferred to other jobs within the district, and some 200 staff and hourly-rated people in the Manitoba Division are being transferred to other jobs within the division. These transfers will fill positions at mines and plants which the Company hopes will become available from normal attrition over the next several months.

In addition to the lay-offs and transfers announced October 29, between September and the end of October approximately 250 staff positions in the Company's two operating divisions and in the Toronto area were discontinued, many of them through early retirement.

Two-thirds of the production cutback is effective in the Company's Ontario Division and the balance in Manitoba. It involves:

1. Suspending operations at Clarabelle No. 2 Open Pit in Sudbury from November 1; at Pipe No. 1 shaft near Thompson, Manitoba, by December 1; and at No. 3 shaft of the Creighton Mine, and the Creighton Mill, both in the Sudbury district, by January 1972.
2. Reducing production at the Stobie section of the Frood-Stobie Mine in Sudbury; the Pipe Open Pit in the Manitoba Division; and reducing production of electrolytic nickel at the Port Colborne Nickel Refinery.



Decline in nickel sales has resulted in a rapid rise in inventories, as indicated by nickel stockpiling at the Port Colborne refinery.

Huntington cuts work force too

Soft business conditions have resulted in the recent lay-off of 189 hourly employees and reductions in the salaried staff of approximately 100 people at Inco's Huntington Alloy Products Division.

"The hourly-paid work force is the lowest it has been in 11 years," said R. W. Simmons division president and general manager.

About one-third of the reduction in the salary rolls has been accomplished by normal attrition, mainly retirements. Severance arrangements for other affected salaried employees compares favorably with those afforded by other companies under similar circumstances. In addition, the division has engaged a professional consulting service to assist in job relocation.

Inco's sales and earnings down for 3rd quarter

Reduced deliveries of primary nickel and rolling mill products, higher unit costs and expenses, and lower average prices received for copper, caused a sharp decline in the Company's earnings for both the third-quarter and nine-month periods, according to Henry S. Wingate, chairman of International Nickel.

"The economic slowdown in the major industrial nations, which has lessened the demand for metals, is chiefly responsible for the Company's reduced deliveries of nickel," Mr. Wingate reported. "Furthermore, nickel consumers have been reducing their inventories and have been using a higher proportion of nickel-containing scrap, which is currently in ample supply.

"In recent weeks, orders for rolling mill products, and to a lesser degree for primary nickel, have increased slightly in some markets, and there are indications that the level of the Company's sales may have touched bottom in this third quarter," he said.

Inco's earnings for the first nine months of 1971 were \$86,378,000, equivalent to \$1.15 a common share, compared with \$160,662,000, or \$2.16 a share for the first nine months last year, Mr. Wingate announced.

Third-quarter earnings were \$23,729,000, or 31 cents a share, compared with \$50,253,000, or



Established in 1936



This month's cover

Don Dunbar, the Triangle's first editor, retired this month. Many of his friends gathered at the Caruso Club last week to honor him. The story is on page 4.

Published for Ontario Division employees of The International Nickel Company of Canada Limited.

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79 cents a share for the corresponding period of 1970. A quarterly dividend of 25 cents a share, has been declared, bringing total dividends for 1971 to \$1.30 a share, compared with \$1.40 a share in 1970.

For the first nine months of 1971, net sales totalled \$613,796,000, compared with \$802,981,000 for the first nine months of 1970. Third-quarter sales were \$173,270,000, compared with \$262,206,000 for the same quarter of 1970.

Triangle photographs available

Prints of photographs appearing in the Inco Triangle may be ordered direct from: Dionne Photography, 170 Boland Ave., Sudbury. Or call: 674-0474.

INCO FAMILY ALBUM



Harold Langen and his wife, Bertha, have heard the patter of 24 little feet over the years in their home in the Blezard Valley. Harold is a motorman on the 1000 level at Frood Mine and started with the Company in 1946. He was born at Roche Perce in Saskatchewan. In the back row are Helen, 14, Dolores, 17, Allan, Jocelyn (Mrs. Robert McIlvenna), and Ken, 15. In the middle are Diane, 23, Harold, and Mrs. Langen, and Marie, 21. The younger set in front are Lisa, 7, Sylvia, 10, Anita, 11, Elaine, 8, and Doreen, 5. Mrs. Langen worked from 1942 until 1945 as a timekeeper in the Copper Cliff Smelter nickel reverbs.



Seven years' police work in Ottawa preceded Nelson Wall's start with Inco in 1966 at Creighton. He transferred to the process technology department in 1967 and works as a sampler in Copper Cliff. Both he and his wife, Mary, are from the Ottawa Valley. Their three children are Karen, 15, Ramona, 13, and Perry, 6. The Wall residence is in Sudbury where Mrs. Wall works as a pharmacy aid at the General Hospital. The whole family likes snowmobiling.



A violent windstorm was lashing the countryside when the Triangle visited the Cox family in their mobile home on the banks of the Spanish River near Worthington. A falling tree had cut the power line, so this group was posed by candle light. A tank-house section man at the copper refinery, Brian was born in Victoria, British Columbia, came east to settle in Niagara Falls in 1963, and left a career in accounting to join Inco last spring. Seen with Brian and his wife, Paula, are their young family of Toby, 18 months, Jeffrey, 7, and Johnny, 5.

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Aurele Desbiens started with the Company in 1959 at Garson Mine and transferred to Kirkwood when it opened last year. He is a raise driller on the 400 level. Aurele was born in Sudbury as was his wife, Connie. Their three children are Larry, 10, Laurie, 6, and Mark, 4. Aurele enjoys hunting, making house renovations, and televised hockey. The Desbiens live in Garson.



One of Port Colborne's hardest workers in the scouting movement is Larry Whitty, shift leader in No. 1 Research Station. Larry is past district commissioner and presently is overall supervisor of leader training. His wife, Mary Lou, in addition to the family duties, still finds time to help out with Cubs. All the children except John belong to some branch of this worthy organization. They are Kevin 11, Maureen 9, Kathy 10, and front, John 2. Coleen 5, and Carol 7.



This is Ruth and Lloyd Prowse's family — and all the male members are Inco employees. A garage mechanic at Creighton No. 3 Mine, Lloyd joined the Company in 1948. Gary is a gas tester with the process technology department at Copper Cliff, and Wayne a timekeeper at Creighton No. 5 Mine. Carol, 17, attends nursing school in Toronto. Born in Kingston, Prince Edward Island, Lloyd grew up in Nova Scotia — Ruth's home province. Their two trusty Chihuahua watchdogs are Bubbles and Buttons.

Residents of Lively, the Prowse family lost their home during the tornado that ripped through that town last year. They rebuilt on the foundations of their old house.

Don Dunbar and the Triangle



Helen T. Dunbar

"Periodically the Triangle will try to pin to its pages glimpses of the fascinating panorama INCO paints across the industrial life of Canada and the world. It will print articles describing in layman language phases of operation and recent developments so that employees may be brought into closer touch with their company's far-flung activities. It will probe the reminiscences of veteran workers, whose record of faithful service is a matter of deep pride. It will tell what the Copper Cliff cousins, and the Port Colborne nephews, and all other branches of the big INCO family do with themselves in their leisure hours."

That was how Don Dunbar announced the Triangle in his first issue of the magazine in September 1936. And it's a measure of how well he succeeded that 35 years later, the Triangle is still trying to achieve the same objectives: explaining the Company in layman's language to Inco employees. Until the September issue, the man guiding the direction of the Triangle was its founder: Don Dunbar.

He's retired now

As long as the Triangle is published, he'll never retire. For the Triangle and Don are inseparable. And that's the reason the magazine bids a fond farewell to him and took him out, not with-

out protest, from behind its pages. The only other time Don Dunbar's photo has appeared in the Triangle was when he joined the Quarter Century Club in 1969.

Triangle started in 1936

His first visit to the Sudbury area was in 1933, when W. E. Mason, the Sudbury Star's publisher hired Don to write and produce a special issue commemorating the 50th anniversary of the discovery of nickel. While here, Don suggested to Donald MacAskill, then general manager and vice-president, that an employee magazine would be an asset to the Company. Three years later, R. Leslie Beattie, Mr. MacAskill's assistant manager, called Don back to Sudbury to create this magazine.

A more ideal selection couldn't have been made. Don's father was the publisher and editor of the Estevan Mercury, a Saskatchewan weekly newspaper and Don was born with printers' ink in his veins. As he recalls: "I was in the shop as soon as I could make a 'nuisance' of myself." In fact, he was writing a column on local personalities when he was only 14. He rode his bicycle from farm to farm to do the interviews.

One of Don's favorite stories concerns the decision to move the Mercury's presses to a new building. The inevitable delays occurred and on press day, the

presses were only half-way there. The paper had to come out, so, Don said, they anchored the presses as best they could, and tied down the gas engine which ran them, and printed the paper on the street. Fortunately, he added, it was a beautiful day, and the street was lined with people watching the paper come out.

Grew with Triangle

The excellent standards of the photographs in the Triangle are now taken for granted, but until Don put out his first issue, he had never taken a serious photograph.

Gordon "Sparky" Harry, of the engineering department, showed him how to use an old view camera used by the engineers. The Triangle's first camera was a Speed Graphic, "which weighed a ton," Don said. His first pictures with it were almost a disaster. Robert C. Stanley, chairman of Inco, was on an inspection tour of the Froid Open Pit. Don took a lot of photos and rushed them in for processing only to find all the negatives were blank. He'd forgotten to pull the "dark slide" out of the back of the camera (one of the astronauts recently made a similar mistake on a moon mission). Don went to Ralph Parker, who told him Stanley's party would be touring Le-vack the next day.

Bright and early the next morning, Don was ready in Le-

vack, and as he describes it, it was more like an ambush. "I stepped out from behind a tree, and making no mistake about it, took my pictures." Stanley was amused by the number of photos Don was taking and jokingly said: "Young fellow, you're going to wear out that new camera if you're not careful."

A self-taught photographer, Don's photos have not only appeared on Triangle pages, but also in many well-known magazines, illustrating Company operations or products. And as photographic technology improved, Don changed with the times, becoming one of the first to adopt the miniature camera, (120 and 35 mm.) for press use.

The Triangle started as a bi-



Don Dunbar says "au revoir" to his friends at his retirement party held last week. He is now writing a history of International Nickel's Canadian operations for the Company.



Ted Gaetz recalls a humorous moment as Don's cottage neighbour.

monthly, appearing in what is called "tabloid" form. The newspaper-size didn't last long, however, because readers complained it was awkward to handle and hard to file. So in 1937, the Triangle shrank slightly to its present size.

In those days, all the type was set at the Sudbury Star, where the pages were also made up in heavy metal forms. Don used to drive all night to the printers in Toronto with his car wallowing all over the road due to the weight of the lead forms. The Triangle is still printed in Toronto, but the modern offset-lithography process is used.

Our famous nameplate was based on an idea Don had, combining all the elements of mining, smelting and refining. The artistic talent was supplied by Fred Cowling, then a member of the Copper Cliff engineering department. In the left-hand corner is a miner at work underground with his air-leg drill; at top is a representation of the Copper Cliff mill and smelter buildings; and in the right-hand corner is a casting wheel in the refinery.

In 1939, Don's father died and he returned to Estevan to run the Mercury himself. By 1944, however, he was growing restless and ready for a change and when R. Leslie Beattie, now vice-president and general manager, asked him to return to Copper Cliff and the Triangle, Don

jumped at the opportunity. With the exception of strike periods, the Triangle has published continuously since then with Don as editor.

Don married the former Gwen LaBranche, of Trois-Rivières, Quebec, in Shawinigan Falls in 1914. They have one son, and one daughter, Susan, married to Leonard Kitchener of Inco's mines research department.

Don edited the Triangle during one of the most exciting periods of the Company's history, as it began the switch from war-time priorities to peacetime. During this time, mechanization took over underground and Don covered the introduction of load-haul-dump machines, the development of such new mining methods as top slice mining, undercut-and-fill, and sublevel caving. The first use of sandfill in most mines was also reported on Triangle pages. The expansion of the smelter, the increased use of the fluid bed roaster to produce nickel oxide sinter 90, were all explained in easy-to-understand layman's terms. Computers, environmental protection, the dramatic birth of the tailings farm, and the decision to build the super-stack, were all part of Don's "beat".

And he loved every minute of it, especially when he met people on assignments such as Family Album, pensioners' pictures, or sports stories.

Don logged thousands of miles on the road and in the air travelling to Inco plants, including Port Colborne and Thompson. Until the introduction of IN Magazine last year, the Manitoba Division's own publication, the Triangle was the only Inco employee magazine in Canada.

Not the least of Don's accomplishments were his efforts on behalf of the Quarter Century Club. An enthusiastic supporter of all the chapters, Don not only did an in-depth report on each annual dinner, but handled the production of the program and the stage show in Copper Cliff.

Party honored Don

Last week, almost 200 of Don's close friends and associates gathered at the Caruso Club in Sudbury to honor him. Letters and telegrams from Henry S. Wingate, Inco chairman, Donald Munn, vice-president and general manager of the Manitoba Division, Ralph Parker, and many others thanked him for producing the Triangle, and sent best wishes for his retirement.

The party was entertained by



The Ontario Folklorists entertained at Don Dunbar's retirement party. Here they dance in front of Mr. and Mrs. Dunbar, and Mr. and Mrs. D. M. Fraser.

the Ontario Folklorists, the Sudbury Youth Centre's talented dance group. The Folklorists performed for 45 minutes, demonstrating folk, jazz and modern dance, to enthusiastic applause.

D. M. Fraser, assistant general manager, Ontario Division, presented Don with an ornate letter opener mounted on a polished piece of ore. Speaking for the Company, he thanked Don for making the Triangle what it is, and offered him the Company's sincere best wishes on retirement from the Triangle.

Harry Banasuiik, who recently returned from Thompson to become superintendent of Garson Mine, presented Don with a gag gift from the Manitoba Division.

Inco agriculturist Tom Peters spoke for everyone when he presented Don with a portable typewriter: "Don, this is to ensure

that from time to time we'll continue to read articles written by you."

Among the other gifts Don received were the plate from which this issue's cover was made, and the original pencil sketch. Mrs. Dunbar was presented with a bouquet of red roses.

Also paying tributes to Don were Betty Meakes, wife of the publisher of the Sudbury Star, Tom Dodgson from the Company's Toronto office, and Charles Ott from Port Colborne. Mrs. Meakes expressed everyone's feelings when, referring to the traditional signature with which journalists end their articles, she said: "It's not really '30' for Don today."

A surprise guest at the party was former vice-president Tom

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Charles and Audrey Ott extend best wishes from Port Colborne to Don.



Don's wife, Gwen, and his daughter Susan, and her husband, Leonard Kitchener, watch as he tries out the typewriter he was given at the party.

Wives & Roses



"They're beautiful," said Lillian Koskocky, wife of carpenter Steve Koskocky, about her roses.



"They're a real treat," was the way Alice Pruder described her roses sent by plant manager Vern Barker. Her husband, Bill, is a painter.



"No one's given me roses to hold since I was married," Eileen Wilcox exclaimed. Husband Rae is head stripper at Port Colborne.



Margaret Martine called her roses "gorgeous". She's wife of anode department foreman Carlo Martine.

Port enjoys Quarter Century Club fellowship



Nearly 500 attend Port QCC dinner

"It would be interesting to read the thoughts of the 35 new members who are attending this time-honored function for the first time. I am sure you newcomers to this elite gathering have vivid recollections this evening of the day you came to Inco back in 1946, and of the growth and changes that have taken place over the past 25 years." These were vice-president and Ontario Division general manager John McCreedy's opening remarks at the 22nd annual dinner of the Port Colborne chapter of the Quarter Century Club.

Mr. McCreedy continued: "The new members whom we welcome here tonight joined the Company at a time when it was in the process—for the second time in its history—of shifting its priorities from wartime to peacetime needs. It was a busy period. But in those days Inco's capital expenditures were less than 10 million dollars a year." This year the Company is expected to spend about \$250 million.

Almost 500 turned out last month to honor the 35 members of the Class of '71 and to renew old acquaintances. Mr. McCreedy presented the gold pins to the new members, who were introduced to him by Norm Hillier, assistant to the manager, Charles Ott, assistant to the manager, was chairman of the evening and called the meeting to order.

After the National Anthem, the audience stood in dimmed lights for several moments in remembrance of club members who have died.

Vern Barker, plant manager, welcomed the Class of 1971 to the Quarter Century Club, saying he was very proud of them and their accomplishments. He recalled that many of their fathers were also members of the Quarter Century Club and he added: "I hope to be here when your sons become members of

Port Colborne's Quarter Century Club."

The nickel refinery's new assistant manager, Robert Browne, proposed the salute to Port Colborne's pensioners. He reminded the audience that industry cannot become successful without its most important resource—people. Inco was incorporated in 1916, he said, and since that time has grown to be the world's major supplier of nickel, "and that success has only been achieved through people such as our pensioners."

"Those of us presently involved in the operations of the Company," he said, "are grateful to our pensioners and wish health and happiness to them all in the future."

Pensioner Cameron Lynden, a 40-year carpenter with Inco, replied to the toast. He said that the Quarter Century dinner was one of the highlights of the year when all pensioners look forward to meeting and renewing old acquaintances. He thanked the Company for "getting us all together at least once a year."

A regular attraction at the Port Colborne gatherings, popular Reg Steeves manned the organ and entertained from his large repertoire during dinner. The traditional roast beef dinner was prepared and served by the staff of the Rathfon Inn.

In his keynote address, Mr. McCreedy said: "The current decline in nickel deliveries reflects the slowdown in the metals industry and in the economy in general."

While the market slowdown cannot last indefinitely, it has put the Company in a difficult position, Mr. McCreedy said, with profits down and borrowing up. This has come at a time when the Company faces a continuing demand for cash to finance its growing inventory and its modernization and expansion program, and when "we must rise to the challenge of increasing competition worldwide, and in the face of uncertainties in the

scheduling of our own overseas projects," he said.

Because profits are down, the regular quarterly dividend to shareholders was cut for the first time since 1944, Mr. McCreedy said. At the same time, he noted, "the costs of keeping this vast, complex organization going continue to rise".

But similar low earnings levels have occurred before as nickel demand caught up with supply.



Steve Koskocky is introduced to vice-president and Ontario Division manager John McCreedy by Norm Hillier.



Bill Robinson gets congratulations for 25 years of service from John McCreedy and Norm Hillier.



Julia Vasko, the only woman to join the class of '71, gets a hug from John McCreedy.



The Tramp Champs, a Canadian trio of trampoline artists, take a bow after their finale. Also part of Port Colborne's entertainment were the Williams brothers, a tumbling act, Peggy Jackson, a limbo dancer, Deandra King, a baton twirler, and comedian Bruce Davis.

"In the past, the market has always picked up again as soon as general business conditions improved and inventories had to be replaced.

"In the long term, we at Inco, along with others in the metals and mining industries, have com-

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John McCreedy



Robert Browne



Charles Ott



Vern Barker

Installing a friction hoist is like threading a needle

By Derek J. Wing

Imagine if you can, a 10-foot diameter wheel weighing 21 tons with a 22-inch diameter hole through its hub. Also conjure up a mental picture of a 16-foot long steel shaft and now put the wheel on the shaft. Easy? Well, it might be if the hole in the wheel was big enough, but it isn't. It's 30-thousandths of an inch smaller than the shaft — it's the old quart-in-the-pint-pot problem, known technically as a "keyless interference fit."

In reality this tricky assembly situation has been successfully handled by Inco maintenance and engineering department personnel during the assembly of friction hoists (also known as Koepe hoists) at the top of mine headframes at Coleman Mine, Frood-Stobie No. 9 shaft, and most recently at Little Stobie Mine, where the Triangle camera looked over the shoulders of the erection crew while both hoist wheel and drive motor armature were pressed onto the shaft.

Unlike ground-based conventional drum hoists, friction hoists do not wind in and coil a dead-ended hoisting rope on a drum. Instead of a drum they have a wheel over which hoisting ropes are laid. There are four 1-3/16-inch diameter ropes at Little Stobie. In balance at either end of the hoisting ropes are the shaft conveyances. Hoisting loads are transmitted from ropes to

wheel by the friction that develops between the two, hence the term friction hoist.

Due to the fact that it is not collecting rope, the wheel is relatively narrow — just wide enough to accommodate the grooved urethane treads in which the ropes lie. This condition enables the wheel to be manufactured with a one-piece hub which in turn allows Inco's installation crew to use a unique assembly method when pressing the interference fit wheel and armature onto the hoist shaft.

Two hydraulic systems are used. One expands the hub, while the other provides the pressing power.

For both wheel and armature, the bearing surfaces on the shaft and hubs are stepped by 1/16th of an inch on the diameter midway along their length. Following a meticulously careful lining-up, using screw jacks and chain blocks, the shaft is inserted into the hub until, at the halfway

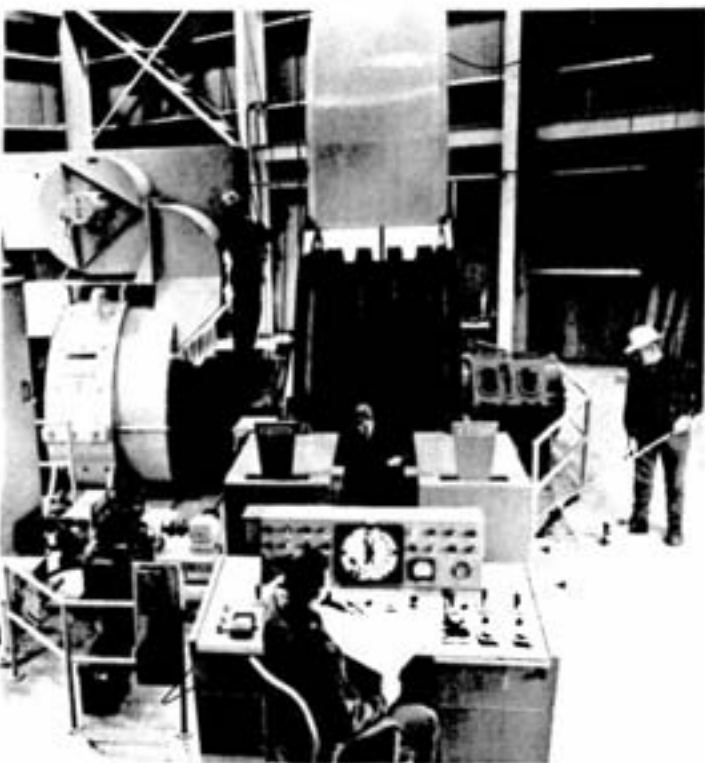
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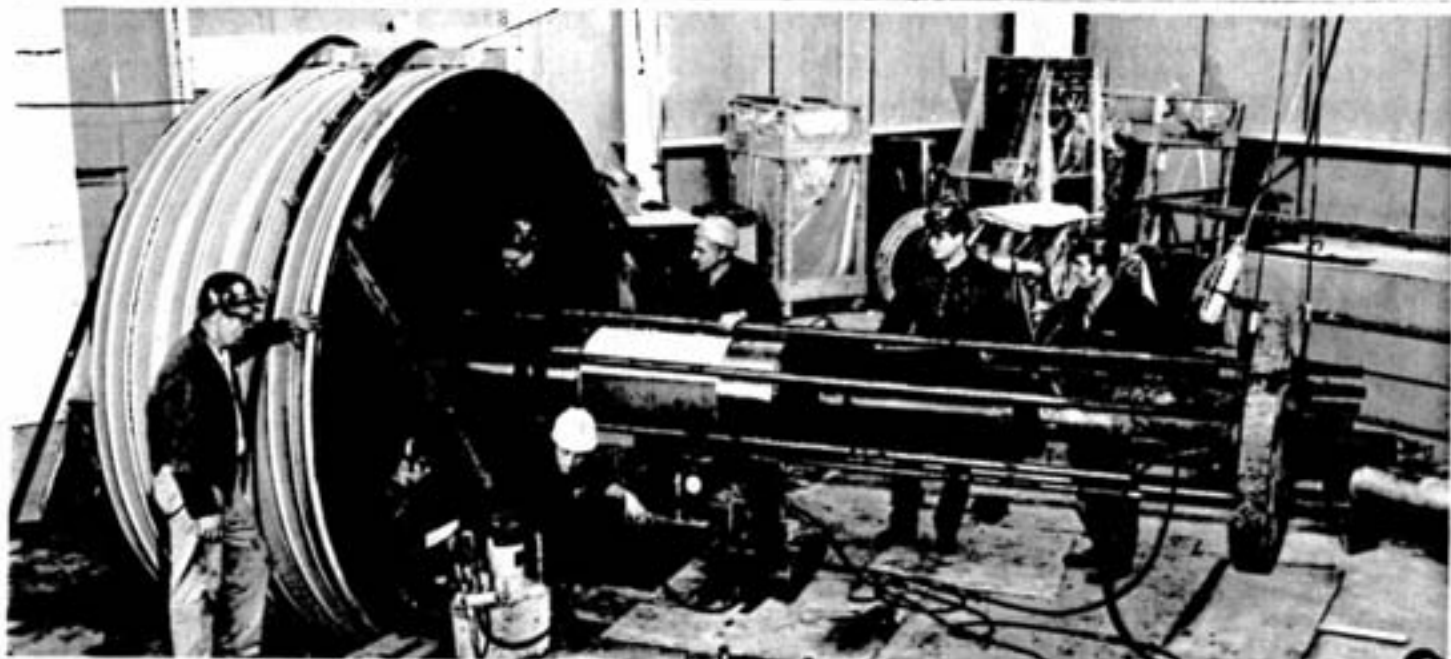
Right, complete and sparkling in its fresh coat of paint, the Little Stobie Mine friction hoist was receiving a wheel inspection when this photo was taken. On the chains of the overhead crane is rigger Duff Leclair. In front of the wheel, on which can be seen the four hoisting ropes riding in grooved urethane treads, is rigger Garnet (Red) Strutt. Hoistman is Leo Chartrand, and light duty man Fred Desjardins is seen putting the finishing touches to the paint job.

Below, comfortably seated in the airy and well lit hoistroom, hoistman Leo Chartrand operates the hoist from this efficiently compact control console.

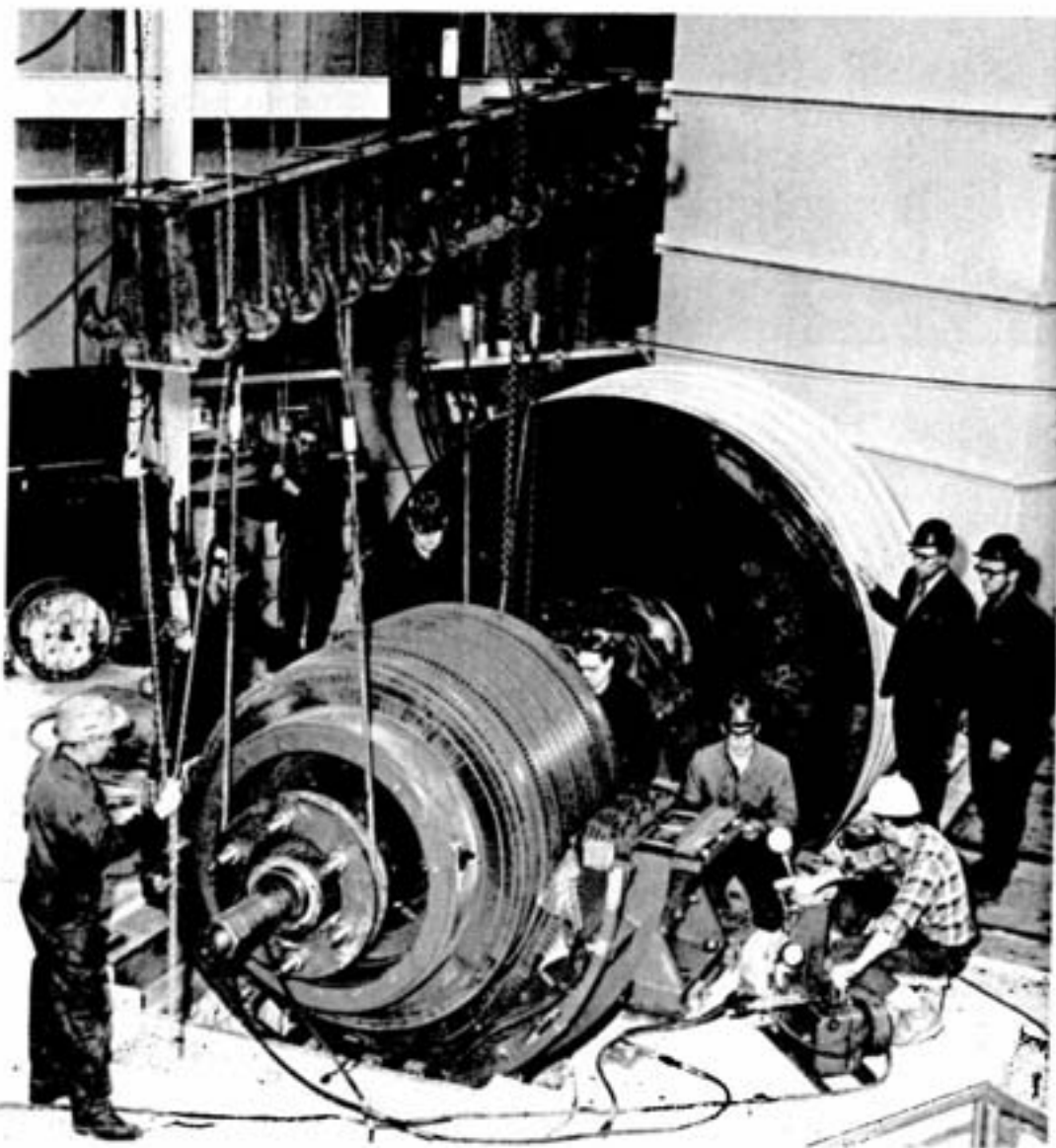


This is a worm's eyeview of Little Stobie Mine's hoistroom. High in the sky at the top of the 185-foot high concrete headframe, it commands a dramatic view of the nearby Frood-Stobie complex.





Taken at the top of the Little Stobie Mine headframe while an Inco maintenance department crew was engaged in the early stages of assembling the mine's friction hoist, this picture shows the pressing equipment used for making the interference fit between wheel and shaft. Bigger than the wheel bore by 30-thousandths of an inch, the shaft is being driven home by hydraulic pump through the ram at the right hand end of the shaft. The hydraulic pump seen left is providing oil pressure of about 8,000 pounds per square inch to expand the hub.



With the shaft now supported by the hoist bearing and the lower half of the motor stator in place, the armature of the 500-hp motor is being pressed into place using the same technique that was applied for wheel assembly. From the left, assembly crew are: Art Mayer, King Croteau, Art Mousseau, Willis Berndt, Glen Johnston, Richard Comacchio, Westinghouse installation engineer Merv Martin at hydraulic pump controls; Lloyd Johns, mechanical erection specialist with the technical specialists section of the Copper Cliff engineering department, and construction foreman Mickey Smyrke.



STEFAN MANDZIJA

Born and raised in L'viv, the largest city in West Ukraine, Stefan Mandzija was a first year medical student when war broke out in 1939. "I just never got the chance to pick up the loose ends and continue my studies," he said.

Shipped off to Germany in 1943, Stefan worked there during the war years, elected to stay there after the armistice, and in 1950 decided that Canada was the place for him.

"It was the best move I ever made," he said. "Here there is freedom."

Stefan joined the Company in 1952. He has worked as a roaster kiln operator in the iron ore plant since 1961. On-the-job at one of the kiln feed stations, he is seen adjusting a cooling water valve.

Prepared expertly by his wife Elizabeth, Ukrainian foods are often served at Stefan's house. Most often it's "pyrohy"—potatoes and cheese baked in a pastry wrapper, or "pampuch"—fruit pie.

CASPER VANDERPOOL

Casper Vanderpool left the sunny West Indies and Trinidad for the more moderate climate of Canada just two years ago.

Starting a five-year instrumentman apprenticeship when



WALKABOUT

The iron ore plant's gourmets reveal their secrets

he was 16, he graduated in 1966, worked at his trade with an oil company in his hometown of Sanfernando, and started his employment as an instrumentman with Inco at the iron ore plant in the spring of 1970.

A member of the planned maintenance department, Casper is seen on-the-job in the roaster kiln building control room.

Intent on widening his field of knowledge, he is currently attending courses on photography, physics, and instrumentation.

Apart from the balmy breezes of the old country, Casper misses the colorful street carnivals and the succulent taste of callaloo and crab meat. "Callaloo is a leaf vegetable," he explained. "We cut it up and boil it along with the crabs—it's delicious."



STEFANOS TSIRIKOS

A newcomer to the Inco scene, Stefanos Tsirikos came to International Nickel last January, fresh and salty from five years' exposure to ocean breezes. He served as a merchant marine engineer with the Greek Merchant Navy, and the Greek Royal Navy.

Born in the Greek seaport of Piraeus, 26-year-old Stefanos is single, and made many trips to Canadian ports before he decided to settle here to "seek a better life".

A powerhouse stationary

engineer, his picture was taken following a check of the sight lubricators on one of the vacuum pumps that provide suction for vacuum filters throughout the iron ore plant.

Ambitious to improve his education, Stefanos spends a great deal of his spare time completing correspondence courses. His favorite subject is math—his favorite meal is "musaka", a dish made from alternating layers of ground meat, vegetables, and cream.



CARMELO FILIPPONE

Carmelo Filippone's picture was taken during his first shift back on-the-job after a seven-week vacation in Italy. Most of the visit was spent at his parent's farm near Locri, but one week was set aside to take in the sights of Rome. It was his third trip to the old country since he set out for Canada in 1959.

A kiln operator helper, Carmelo was checking a natural gas burner on one of the roaster department's 180-foot by 13-foot diameter rotary kilns when the camera zeroed in on him.

Carmelo's service with International Nickel dates back to 1965.

Italian foods are regular fare at the Filippone home on Charlotte Street in Sudbury. "My wife Francesca is a wonderful cook," said Carmelo proudly. "Her pizzas are out of this world." His favorite kind are topped with mushrooms and cheese.



PAULI PAULINS

Backgrounded by 550-pound drums of nickel oxide ready for shipment, loading machine operator Pauli Paulins was photographed in the plant's blending and packaging building.

As the crow flies, there are about 8,000 miles between Pauli's birthplace in Latvia and his comfortable Canadian home on Trout Lake in Sudbury.

Pauli's journey between the two places began in 1944 with a move to Germany, continued with a jump to England in 1947, and was completed when he crossed the Atlantic for Canada in 1955. His employment with Inco started the same year.

His wife, Dorothy, hails from Wimbledon, England. They were married there in 1952, and now have a family of three sons.

The biggest challenge that Pauli faced due to his globe hop was the language problem. "It took me all of five years to master English," he said. "It was hard work—I read every book I could lay my hands on."

His favorite old country snack is a "piragi" roll. "Bread baked with chopped bacon in the mix. It goes great with a bottle of beer and a hockey game," he said.

JAN GOEDHARD

"I was born in Bergharen, Holland," said Jan Goedhard with a faraway look in his eye. "It's a very old town—our church was built about 1400."

A locomotive engineer prior to his move to Canada and Inco in 1955, Jan is an operator in the ammonia leaching building, and was making a routine inspection of a magnetite disc filter when the Triangle photographed him.

He and his wife, Geesje, live in Coniston and have a family of two sons and a daughter.

A Dutch food specialty that



takes Jan back to his boyhood days on a dairy farm is "Boere-Kool met spek" — farmer cabbage and pork. "It's cooked in a big pot, potatoes on the bottom, cut-up cabbage next, and then a piece of pork," he explained. "When it's cooked, the potatoes and the cabbage are mashed together with the pork juice and water — just talking about it makes me 'hongerrich'."

ANDRIUS RUPKALVIS

Andrius Rupkalvis was born in northern Lithuania, in the town of Naumištis (New Town), close to the German border.

His arrival in Canada in 1951 followed a five-year stay in England where he earned his living as a landscape gardener. Before that, he spent five years working in Germany.

He joined International Nickel in 1951 at the Coniston smelter, worked on the iron ore plant pilot project there, and moved to the production plant when it was completed in 1955.

A roaster operator, Andrius is seen inside one of the plant's six 42-foot high by 26-foot diameter fluid bed roasters, checking the unit's 800 tuyeres during a scheduled shut-down.

Andrius and his wife, Roma, have a family of three and

live in New Sudbury. "Gardening is my full time hobby now," said Andrius. "I tried hunting, but after somebody's buckshot whistled about my ears, I decided my garden was the safest place to be."

Asked to recommend a tasty Lithuanian dish, Andrius settled for "bulviu klaskai". "Cover meat or cheese with a pastry made from grated raw potato and mashed baked potato, boil it, and you've got a meal that will make your mouth water," he said.

BORYS HARBULIK

The country of his choice since 1948, Canada is described by Polish-born Borys Harbulik as "a beautiful country with miles and miles of wide open space and unspoiled bush land."

Born in Pohost in the district of Pinsk, Borys earned his living in Poland as a mailman, had risen to assistant postmaster at Serniki when he set his sights on Canada.

An Inco employee since 1957, he works in the pelletizing building as a balling disc operator helper. Pumped in



a dewatered state from the leaching building, the filtercake in the picture is on its way to the balling disc and then on to the building's giant sintering machines.

Borys and Nadzieja, his bride of 1940, are the parents of two sons and a daughter.

Arriving home from work, Borys is often greeted by the mouthwatering aroma of "flaczki". "Beef tripe, onions, potatoes, and spices, all swimming in gravy," said Borys with a wink, "that's good."

SAVERIO GUIDO

In 1951, Saverio Guido packed his bags, kissed his wife Louisa and his two daughters good-bye, and left his hometown of Cosenza in southern Italy

to set up a new home for them in Canada.

Some four years later, his family joined him in Sudbury, and Saverio met his third daughter for the first time. Born just two months after he left, little Rita had been just a photographic print for more than three years. Since then the Saverios have added three sons to their family.

Saverio's employment with Inco started at Copper Cliff in 1956, with his move to the iron ore plant coming in 1963.

A roaster operator helper, he was photographed while preparing to enter one of the roaster kiln building's electro-



static dust precipitators to correct a malfunction. Utilizing 75,000 volts of direct current the unit cleans roaster exhaust gases before their transfer to the nearby C.I.L. acid plant.

Asked to select his favorite old country food, Saverio settled for ravioli.

HERBERT MILDENBERGER

"I came to Canada looking for peace and opportunity," said Herbert Mildeberger, "and I found lots of both."

Herbert left his native country, Germany, and his birthplace, Karlsruhe, and "came looking" in 1951.

During his earlier years he served a machinist apprenticeship, fought on the Russian front, and before coming to Canada was a police sergeant in Karlsruhe. He joined Inco in 1952.

A stationary engineer, Herbert is seen starting up one of the two 9,375 KVA turbo-generators in the powerhouse. These convert waste steam from the roaster kiln building boilers into power that is fed into the iron ore plant's power system.

A meal that often graces the Mildeberger table is "spätzle und bratenfleisch mit sosse" — a flour, egg and milk



dough that is boiled and cut into strips with roast beef and gravy, followed by a full glass of "what else? — Rhein wine."

Herbert and his wife, Anna, are parents of three.

DON MING NG

The Triangle hit the jackpot with the last person photographed and interviewed — a real live chef in the person of carloader Don Ming Ng.

At the age of 16, Don moved into the kitchens of the Balmoral Hotel in Sudbury, and two years later ran his own show as the proprietor of the Arena Inn. After seven years on his own he transferred his skills to the National Gardens.

Don was born in Canton, China, and was 13 when he came to Canada to join his father in Toronto in 1951.

At the end of our lineup, Don is the logical person to be seen with one of the end products of the iron ore plant. In a loaded 70-ton railroad car, Don displays some of the 68% iron pellets that are on their way to a customer.

A man who naturally does most of the cooking at home, Don selected fish or shrimp chop suey as the dish that he and his wife Julia, and their daughter, Kimberly, agree upon as their joint favorite.





Copper Cliff's new water tank dwarfs its predecessor on the left. Standing on top of the new tank is a fitter.

Better water for Copper Cliff area

International Nickel is building a 15,000-gallon-per-minute water treatment plant near Creighton, which is part of a new pumping, distribution, and storage water system. All but the new plant will be completed by year-end. The new facilities will serve the towns of Creighton, Lively, and Copper Cliff, as well as all Inco installations between Creighton and Murray Mines.

The new plant, to be ready in mid-1973, will replace 11 chlorination stations now used to treat drinking water. It is also unique in that it will be built under a turn-key contract. The consortium of contractors chosen will be responsible for the design of the building, selection of the systems to be used, construction, and initial start-up. When the plant is operating successfully, it will be "turned over" to the Company.

Although the Ontario Water Resources Commission has tested the Vermilion River and found it suitable for drinking, the new

plant will guarantee water quality that is consistently odorless and colorless.

Seven mile pipeline

Water will be pumped seven miles from the Vermilion River to the new Creighton water plant in twin 24-inch pipelines, constructed of prestressed concrete. From the Creighton plant, the treated water will be pumped into another pipeline system which will distribute the water to the various centres. There are, in all, over 15 miles of pipelines involved in the system.

Water tank is b-i-g

Built beside its smaller predecessor, the new water tank above the Copper Cliff Club has a capacity of 16 million gallons, 16 times larger than the old one which was completed in 1962.

Construction began in April, and final pressure tests and sterilization will be completed this month. Design and erection were by Horton Steel Manufacturers, to suit specifications

drawn up by Inco's general engineering department.

The largest water tank in the Sudbury area, the vessel is 48 feet high and 240 feet in diameter. The outer walls of the tank consist of six 8-foot high steel plate rings which diminish in thickness from the bottom (1-3/8-inches) to the top (7/16 of an inch). The conical roof is supported by interior columns. To eliminate the need for costly insulation and heating equipment, an automatically fluctuating water level will prevent freezing.

When filled with water, the whole structure will weigh a massive 135 million pounds. Built 15-feet higher than the old tank, the new one will deliver water to users at a slightly higher pressure than before.

Port Colborne

(Continued from Page 7)

plete faith in the future of nickel. Our large capital expenditures give substance to that faith. We are looking forward to a continued yearly growth rate in nickel consumption of about seven per cent.

"The Company needs the active support of all employees during the current critical period. It comes down to a simple case of mutual interest. Only by increasing productivity and efficiency, and by being realistic in all matters affecting the Company, will the interest of both the Company and the employees be served."

The completion of a million-dollar construction project to accommodate the nickel 95 program at Port, and a new \$3.6 million plant to produce new additives for the foundry industry, were visible evidence of the Company's long-term confidence, he said.

"Research and development is one of the cornerstones of the industry, and that is why so much thought and energy and so many resources have been put into the Port Colborne research station complex," Mr. McCreedy said. "It will continue to be the proving ground for major developments in the nickel industry," he promised.

"We have to continually tailor our operations to meet the ever-changing demands and stresses placed upon us by fluctuating economic and market conditions," he said. "Our future success will depend largely on our ability to pull through the present difficult period with as little disruption and loss as possible."

Port Colborne couple get royal message for 50th anniversary

A personal letter from Queen Juliana of the Netherlands was the most prized congratulatory message received when Mr. and Mrs. Arnold Vandenbosch celebrated their golden wedding an-



niversary last month. The couple were guests-of-honor at a reception held at the home of their daughter Mary and her husband, William Mione.

Arnold was born in Landbroek, near Doorn, Holland, and married Betty Bonsink at The Hague in 1921. They have three children, and 11 grandchildren.

"Dutchy", as he is best remembered by his friends at Port Colborne, retired in 1961 with 31 years' service.

Friction hoist

(Continued from Page 8)

point, the taper leads of the interfering diameter (30-thousandths of an inch difference) meet. They are then preloaded with a 3-to-4-ton pressure by a horizontally acting hydraulic ram.

There is now a sealed 1/16th-inch deep pocket running around the leading (smaller diameter) bearing surface on the shaft. Hypoid gear oil from the expansion pump unit is introduced into this pocket via drilled holes and a full circle groove cut into the larger diameter bearing surface of the hub close to its inner end.

Expansion pump pressure is raised until oil is observed to be leaking from both ends of the hub, then ram tonnage is progressively increased to obtain an insertion rate of not more than half an inch per minute until the final position is reached.

Applied expansion pump pressure ranges between 8,000 and 9,000 pounds per square inch, while the ram is providing a pressing load of about 120 tons.

One of three portholes in the new water tank forms a frame for the Copper Cliff Smelter. The portholes provide easy access for maintenance, cleaning, and painting of the giant tank.



Wingate steps down— Gagnebin, Parlee, Grubb to get new posts

Henry S. Wingate, chairman of The International Nickel Company of Canada, Limited, has announced that, in accordance with the understanding he has had with the board of directors



Henry S. Wingate

Albert P. Gagnebin

and officers since 1969, he will relinquish his responsibilities as chief officer following the Company's annual meeting on April 19, 1972. Mr. Wingate will continue as a director of the Company.

Mr. Wingate also announced that the board, in order to facilitate the Company's internal organizational planning, has ex-



James C. Parlee

L. Edward Grubb

pressed its intention of electing the following officers after the annual shareholders meeting:

A. P. Gagnebin, now president, will be elected chairman of the board.

J. C. Parlee, now senior executive vice-president, will be elected vice-chairman of the board.

L. Edward Grubb, now executive vice-president, will be elected president and chief executive officer.

The board, Mr. Wingate also stated, has adopted a policy making 65 the mandatory retirement age for executive officers of the company.

Henry S. Wingate was elected chairman of the board of directors and chief officer of The International Nickel Company of Canada, Limited and its United States subsidiary, The International Nickel Company, Inc., in 1960. He had been president of both companies since 1954.

Mr. Wingate joined The International Nickel Company of Canada, Limited in 1935 as assistant secretary and as assistant

to the president of its United States subsidiary. His association with International Nickel began in 1930 while he was on the staff of its general counsel, the firm of Sullivan & Cromwell. He was elected secretary of the parent Company in 1939, a director in 1942 and vice-president in 1949.

Mr. Wingate, who was born in 1905, graduated from Northfield High School, Northfield, Minnesota, and attended Carleton College, receiving a Bachelor of Arts degree in 1927. He received the degree of Juris Doctor from the University of Michigan Law School in 1929, and has been awarded a number of honorary degrees.

ALBERT P. GAGNEBIN

Albert P. Gagnebin has been president of The International Nickel Company of Canada, Limited and its United States subsidiary, The International Nickel Company, Inc., since January 1967. He is also a director and member of the executive committee of both Companies, a member of the advisory committee of the parent Company and a director of a number of International Nickel subsidiaries.

Mr. Gagnebin had been executive vice-president of the parent Company and its United States subsidiary since 1964. Before that, he was vice-president of the parent Company for four years. He had been elected a vice-president of The International Nickel Company, Inc., in 1958.

His association with International Nickel dates from 1930, when he held a summer position at its Huntington Works in West Virginia. In 1932, he joined the staff of the research laboratory of The International Nickel Company, Inc., then located at Bayonne, New Jersey, engaging in ferrous metals research. A co-inventor of International Nickel's ductile iron, he transferred to the New York office in 1949 to establish a group for the commercial development of this material. In 1955, he was appointed assistant manager of the nickel sales department, and became manager in 1956.

Mr. Gagnebin, who was born in 1909, attended Yale University, receiving a Bachelor of Science degree in mechanical

engineering in 1930 and a Master of Science degree in metallurgy in 1932.

JAMES C. PARLEE

James C. Parlee has been senior executive vice-president of The International Nickel Company of Canada, Limited since January 1967, and a director since June 1965. He has also been senior executive vice-president and a director of the Company's United States subsidiary, The International Nickel Company, Inc., since December 1967.

Mr. Parlee had been executive vice-president of the parent Company since 1964. He was elected vice-president in 1960, and had been in charge of the Company's operations in Canada since 1963. Prior to his election as assistant vice-president in 1958, he worked in various supervisory capacities in the Company's Canadian divisions. He joined International Nickel in 1933. He is also currently chairman and a director of the Canadian Nickel Company, Limited.

Born in 1911, Mr. Parlee received a Bachelor of Science degree in mining and metallurgy from the University of Alberta, Edmonton, in 1933.

L. EDWARD GRUBB

L. Edward Grubb was elected a director and executive vice-president of The International Nickel Company of Canada, Limited in January 1971.

Prior to his present position, he had been a vice-president of International Nickel, and chairman of the Company's United Kingdom subsidiary, International Nickel Limited, since October 1968.

He had been managing director of International Nickel Limited since November 1967 and chairman of that Company's rolling mill division, Henry Wiggin & Company Limited, since January 1968. Mr. Grubb moved to the United Kingdom as managing director of Henry Wiggin in 1964.

Mr. Grubb joined the International Nickel organization in 1934 in the company's Advertising Department. In 1935, he transferred to the accounting department of the Company's Huntington Works. In 1937, he moved to the Company's Bayonne works and was general superintendent there from 1942 until 1953, when he was appointed general superintendent of the Huntington Alloy Products Division in West Virginia.

In 1957, he was elected assistant vice-president of The International Nickel Company, Inc., at which time he was transferred to New York and placed in

charge of labor relations at all the Company's United States plants. One year later, he was appointed general sales manager of the Huntington Alloy Products Division and was elected vice-president-sales for that division in May 1960. In December 1961, Mr. Grubb was named vice-president of The International Nickel Company, Inc., with responsibility for primary nickel commercial activities in the United States. It was shortly after his election in 1964 as assistant vice-president of the parent company that he was transferred to Europe as managing director of Henry Wiggin, and as a director of International Nickel Limited.

Mr. Grubb, who was born in 1912, attended Wesleyan University, Middletown, Connecticut.

Don Dunbar

(Continued from page 5)

Gaetz. A close friend of the Dunbars and a cottage neighbour, referred to Don's reporting: "He seemed to be able to capture the life of the community and the whole district in a personal way, but also objectively." He also quoted one of Ralph D. Parker's comments about Don's work: "When the Triangle comes out, it really sparkles."

Taking centre stage to thank his friends, Don said the good words about the Triangle are shared by many others including Bert Meredith, Derek Wing and Terry O'Connor, who were his assistant editors. "It's been a wonderful experience and I've been grateful for it," he said about his years as Triangle editor. "My years of association with Inco, with a ringside seat on one of the most progressive and active companies in the world, have been a real privilege. No 'news hack' could ask for more."

Taylor, Zurbrigg to new assignments

R. R. Taylor, heretofore, director, exploration, has been appointed to the position of director, operations, Inco Canada. He will report to L. E. Grubb, executive vice-president.

H. F. Zurbrigg, vice-president, exploration, will transfer from New York to the Toronto office as soon as practical. He will continue to be responsible for the world-wide exploration activities of the Company from that location.

Retired on Inco Pension

WITH 20 OR MORE YEARS OF SERVICE

ALBINI CHARTRAND

Frood pillar leader Albin Chartrand turned off the air on his drill recently for the last time after almost 33 years' service.

Both he and his wife, Vivianne, are from small farming communities east of Ottawa where Albin



Mr. and Mrs. Chartrand

worked his family's farm for several years before coming to Sudbury and Inco. His marriage to Vivianne St. Jean took place in 1937 at Hammond, his wife's home town. They have one son.

Albin plans to spend most of his retirement "keeping up the property" at the Chartrands' Sudbury home.

JOHN HARRISON

John Harrison's indirect association with the Company far predates his period of employment with Inco. His first job at 14 was cutting cordwood on contract for the Mond Nickel Com-



Mr. and Mrs. Harrison

pany's smelter in Coniston. John started with Inco in 1940 at the Garson sandpit, moved to the Coniston Smelter, and later to Frood Mine until 1944, when he went permanently to the copper refinery. Much of John's service at the refinery was spent on the casting wheel.

He grew up in Hanmer but was born in the County of Matane, Quebec. His wife, the former Mrs. Henri Troitier (Bertha), is from Bonfield in the North Bay area. They were married in Sudbury in 1963.

John plans to travel to California to visit a sister.

MARSHALL KOSTASH

"I've never worked for any other outfit but Inco and I enjoyed working for the Company and with the men. If I had it to do all over again, I doubt if I'd do it any differently."

Marshall Kostash was looking



Mr. and Mrs. Kostash

back on his 36-year association with the Company, which started the same year he graduated from the University of Alberta with a B.Sc. degree in chemistry and metallurgy. The Kostash homestead was at Vegreville, east of Edmonton.

All of Marshall's service was in the Copper Cliff Smelter where he was safety engineer from 1938 through 1943, and superintendent of the separation and sintering department from 1967 onwards.

He married Mae Wulff at Copper Cliff in 1937. They have a family of two children and four grandchildren.

Travelling and movie photography are the couple's favorite recreations. Mr. and Mrs. Kostash will continue living in Copper Cliff.

LIONEL COTE

After 25 years, Lionel Cote of the Port Colborne Nickel Refinery has retired. Lionel was born on a farm in the town of Weedon, Quebec in 1906. Except for six years working in the eastern United States, Lionel spent all his early life working the farm with his Dad.

After working for one year at the Empire Cotton Mills in Welland, Lionel joined Inco in 1946 in the electronickel refinery and completed the full cycle from



Mr. and Mrs. Cote

shear labor to cementation-man. In 1965, he transferred back to the shearing department where he remained until retirement.

A Kapuskasing girl, Irene Marleau, became Mrs. Cote in 1947. They have two children: Ted, presently a second cook on one of the lake boats, and Aline, a secretary in St. Catharines.

"I was working on the farm as far back as I can remember and I still have a soft spot in my heart for it," said Lionel. "In fact,

in retirement I am going to visit my farming friends and lend a hand just to keep in practice." According to Lionel, "the New England States is the place to be," and he expects to spend considerable time visiting there.

MURDOCH MURRAY

When Murdoch Murray came to Canada in 1927 from his birthplace of Glasgow, Scotland, he arrived with his papers in plumb-



Mr. and Mrs. Murray

ing and went straight to Edmonton and a two-year stint in the plumbing trade.

His mechanical background landed him a job at Inco in 1937 in the Copper Cliff Smelter. He worked in the converter and Orford buildings, as a 1st class maintenance mechanic for all his service.

A Copper Cliff girl, Helvi Salo, married Murdoch in 1938; they have four children and eight grandchildren.

The Murrays live in Copper Cliff and enjoy spending a lot of time keeping up with the activities of their grandchildren. Murdoch enjoys long walks around the town.

ALBERT CLIMENHAGE



Albert Climenhage

One of Albert Climenhage's hobbies, besides gardening and hunting, is being a bachelor. Naturally, this gives him lots of time to devote to his favorite pastimes.

Albert was born in Welland, but moved to Port Colborne at an early age. After finishing school, he worked for a short time with his father while learning the carpenter trade. Then, he worked with a gas company for four years but ran into the depression era and was laid off. He found part-time employment, however, unloading lumber and eventually he worked for John Deere.

In September 1950 Albert joined Inco and, except for a limited time spent on the stripping floor in the ENR, spent all of his time in the shearing department.

An ardent hunter, Albert pur-

chased 25 acres of bush land near Bancroft where he built a hunting lodge.

He is especially proud of his gun collection and hopes that he can now realize his one big ambition: to graduate from deer hunting and bag himself a moose.

CHARLES MOREAU

A shift boss for the past 21 years, Charlie Moreau has retired after 28 years with the Company. Charlie was born in New Rich-



Mr. and Mrs. Moreau

mond on Quebec's Gaspé Peninsula, and worked six years shaft-sinking in the Noranda area before coming to Inco. His service ended at the Clarabelle Open Pit and was preceded by stints at Frood-Stobie, Garson and Murray.

Charlie is the father of six children; his wife, the former Agnes Cyr, also hails from New Richmond. They were married in their home town in 1938 and have one grandchild.

The Moreaus have enjoyed travelling in the past with trips to Hawaii and Europe. Their plans include spending most of this coming winter in Florida although Sudbury will remain their permanent home.

BOB ELLIOTT

"I decided sometime ago during several trips out west, that my wife and I would retire to Salmon Arm in British Columbia and we're on our way." Locomotive



Mr. and Mrs. Elliott

engineer Bob Elliott was spelling out some of his plans now that he has retired from the Company with almost 30 years' service.

Both Bob and his wife, the former Margaret (Peg) Kirton, were born in Arrow River near Verdun, Manitoba. Bob's pre-Inco days included 10 years as a carpenter on construction in the four western provinces. He did the same kind of work for Inco at Copper Cliff until 1957 when he became a locomotive engineer, the job he held for the balance of his Company service.

During the Elliotts' stay in Copper Cliff, both were active in the community. Bob was a volunteer fireman for 20 years, and

was active in church affairs. Mrs. Elliott served with the United Church Women since that organization's inception, and was involved with the Copper Cliff unit of the Memorial Hospital Auxiliary. She also taught school for several years in this area.

Married at Sudbury in 1942, the Elliots have one son, Jim, who works as a materials expeditor in the purchasing department at Copper Cliff. Jim's wife, Wendy, also works for the Company as a stenographer in the general engineering department at Copper Cliff.

TOM CROWE

Few people know better than Tom Crowe that it's a long way to Tipperary. Tom was born there. He left Ireland in 1929, and started with the Company in 1930 in the Copper Cliff Smelter, transferring eight years later to



Mr. and Mrs. Crowe

the copper refinery for the rest of his service. He worked as a 3rd class stationary engineer on the refinery's auxiliary boiler for 26 years.

Tommy's first marriage was in 1932 in Sudbury to Bernadette Ouellette who died in 1952. He remarried in 1957, taking Mary McKenny from Ottawa as his bride. The Crowes have three children and five grandchildren.

The couple took a trip to Ireland last August and a repeat visit is a strong possibility. When in Sudbury, the Crowes enjoy camping out in their tent-trailer at the area's provincial parks.

TONY MAZZA



Tony Mazza

Pillar leader Tony Mazza was born in Copper Cliff, and joined the Company there in 1937 after working across the country during the depression. He recalls working at a sawmill north of Sudbury where the workers had a rather uncomfortable concoction for protection from insects: a rubber heel and beef fat dissolved in boiling coal oil and then applied to the body.

Married in Sudbury in 1939 to the former Christine Dasti, Tony is the father of three and the grandfather of one. His daughter, Gwen, is married to Bob Matthews, a section leader in the copper refinery process technology department.

Tony's pastimes include hunt-

ing and fishing (he was in the party this year when fellow Frood pensioner Lloyd Armstrong bagged a 1450 lb. bull moose), as well as bowling and curling.

LORNE CHRISTINK

Lorne Christink has retired to an area just south of his Pembroke birthplace. His wife, the former



Mr. and Mrs. Christink

Leona Berndt, comes from Arnprior, also in the Ottawa Valley. They were married there in 1938, the year after Lorne started with Inco at Frood Mine. He worked in the mine's lamp room. Before coming to Inco, he worked on construction in the Sudbury area for three years.

Lorne's favorite pastime is working on the family cottage at Lake Dore, a popular meeting place for their two children and two grandchildren.

MAGLOIRE LAVALLEE

Magloire Lavallee, usually known as "Maggy", worked almost all his Inco years at Murray Mine.



Mr. and Mrs. Lavallee

He started with the Company in 1947 at the Copper Cliff Smelter, but transferred a year later to Murray where he divided his service between underground and surface work.

Both Maggy and his wife, the former Rita Robillard, were born and grew up in Sudbury where they were married in 1951. They have a family of six children and one grandchild.

LEO DESILETS

Leo Desilets worked all his 33 Inco years in the copper refinery and, except for the first seven of



Mr. and Mrs. Desilets

these years, was a foreman in precious metals in the silver building.

He was born in the Canadian

Soo but grew up in Capreol and Sudbury. Married to a Sudbury girl, the former Louise Jodouin in 1938, Leo is the father of two children. The Desilets also have three grandchildren.

The couple plan to winter in Florida but their home will remain in Sudbury. Leo plays a lot of golf and enjoys televised sports. His pre-Inco days included five years with Bell Canada and two years as a hockey player, both in Toronto.

EMORY EVELINE

Emory Eveline, known as "Chief" by his workmates, started with the Company in 1939 in the Copper Cliff crushing plant. He got his nickname from the late Clarence



Mr. and Mrs. Eveline

Meaden, when the Chief returned from wartime service in the Royal Canadian Navy. Emory was born at Byng Inlet south of Sudbury.

Emory moved from Copper Cliff to the Creighton Mill when it opened in 1952, and to Frood-Stobie Mill when it opened in 1968. He worked as a shift boss most of the time.

Married to Beulah Dodd in 1945, the Chief has one child and one grandchild. Mrs. Eveline is originally from Ottawa.

The Evelines plan to continue living in Lively, but will winter in the south. Emory likes fishing, hunting, and cabinet work, but his grandson takes up a lot of his spare time.

RAY FORTH

Ray FORTH is retiring but with two sons employed by Inco, he will still hear all the Company news. Son Bill is a loader at the iron



Mr. and Mrs. FORTH

ore plant, while Bob is a geological assistant in the mines exploration department at Stobie.

Ray was born at Bracebridge and started with the Company in 1930. All his service was spent in the Copper Cliff Smelter. He was a general foreman in the roaster department for the last three years. His wife, the former Hilda Burrows, was born in Smiths Falls. They were married there in 1939 and have three children and one grandchild.

The FORTHS divide their time

between their home in Lively, and the cottage they have owned at Minnistik Lake since 1958. Ray likes gardening, fishing, and hunting, while Mrs. FORTH enjoys bridge, crocheting, and church work.

IGNACY ZAREMBA

"You'd better call me Iggy in the Triangle: that was my name with



Mr. and Mrs. Zaremba

the boys on the job," explained "Iggy" Zaremba during his interview with the Triangle.

Iggy was born in Poland and came to Canada in 1947, two years before he started work with Inco. A maintenance mechanic, he started in the Copper Cliff Smelter and transferred to the iron ore plant when it opened.

His marriage to Susanna Michailowa-Swiridowa took place in Germany in 1947. Mrs. Zaremba was born in Russia and came to this country in 1948. They have one child.

Although the Zarembas have lived in Sudbury for many years, they plan to make a new home in Florida or Arizona. Iggy's favorite pastime is photography.

HUGH DURANT

"I've certainly never regretted my years with Inco; the Company has been good to me." Hugh Durant was looking back on a working career that included six



Mr. and Mrs. Durant

years as a sailor on the Great Lakes prior to coming to Inco in 1935.

He started underground at the Frood, transferred four years later to the Frood Open Pit, and later to the Clarabelle Open Pit when it opened. He worked as a shovel operator.

Hugh's birthplace was Meaford but he grew up in the Parry Sound area. In 1936 he married Winnie Shadlock at Milliken just outside Toronto. They have three children and five grandchildren. Mrs. Durant taught school in this area for some 21 years.

The Durants live in Sudbury but they move around the country in their 22-foot travel trailer. Late this winter they plan to go south in it to beat some of the northern snows.



Peering into the depths of one of the countless plump pumpkins that gave up their insides to become flickering hobgoblins last Hallowe'en, these youngsters are the 29-strong kindergarten class at Lively's George Vanier Public School who donned their costumes for an afternoon of fun and games organized by their teacher Mrs. Dorothy Cooke.



Faces & Places

One of many such groups to come to Inco at Sudbury each year, seven geology undergraduates from McMaster University in Hamilton spent a day in Sudbury to familiarize themselves with the basics of the area's geology. Accompanied by Dr. J. H. Crocket, one of their professors, the group saw the underground workings at Little Stobie Mine and collected samples of shatter cones and Sudbury breccia south of Kelley Lake. Here, Inco senior research geologist Don Phipps (centre) shows the group a specimen taken out of the geological contact between the Copper Cliff offset and the Creighton granite. On either side of Don are Jack Kleniewski, Dr. Crocket, Keith Treacher and Tim Corkery.



Looking for all the world like a very unusual underground ear inspection, area geologist Elwood Wohlberg was demonstrating the use of ear plugs to three young ladies from Michigan's Grand Valley State College. They toured Coleman Mine together with 17 other (male) geological students and two faculty members. They are Geri Korving, Deborah Hoffman and Connie Chenard.



With shoulder bags at the ready and long hair spilling out from under their hard hats, the girls were the cause of numerous doubletakes as they presented this view to many a startled hard-rock miner.



OK, name it! An aerotruck? A truckplane? The latest in convertibles that allows a motorist to zoom off into the wide blue yonder when the freeways get plugged? Sorry, it's none of them. An irresistible chance shot taken while passing the Froid-Stobie Mill, the picture shows Inco's geophysical research Anson Mk. V while it was being towed over the quarter-mile between the Froid hanger and the Company's Froid airstrip.



Another suggestion plan winner was stationary engineer Lorne Elford, left, who suggested changes to the filter in the copper refinery's main dry, making repairs and replacement easier. He received a cheque for \$225 from Joe Diduch.

Suggestion award winner Vlado Knezevc, right, picks up his \$160 cheque from Wayne Wilson. Vlado, a crane follower in the copper refinery, suggested changes to the crane's electromagnets which reduced maintenance.



Carl Baelde was the first graduate from the Company's trades training program for upgrading maintenance mechanics from helper to 2nd class. The program takes one year and involves on-the-job training, as well as a home study course. Other courses include 1st class maintenance mechanic; 1st, 2nd, 3rd, 4th class stationary engineer; 1st class maintenance electrician; 2nd class carpenter; 2nd class blacksmith; and 2nd class welder. Thirty-five men are presently enrolled in the courses which are voluntary. Here, Carl receives his certificate from Jim Metcalfe, IORP maintenance supervisor, and Sid Stone, training programs coordinator.



Don Marynuk, maintenance mechanic in the converters department, won \$695 for his suggestion to use two female quick connecting couplings on the converter tuyeres punching machines. His idea lowered the consumption of couplings which improved serviceability of the punching machines. Here, Don explains to Fred Burchell, superintendent of maintenance, and suggestion awards coordinator, Brian Smith, how the coupling works.



Timely hitting, excellent pitching and fielding brought Port Colborne its first O.B.A. Major "A" junior ball title with a best-of-three final, two games to one victory over Brantford. The Port Colborne entry was ably coached by Larry Roach of the Inco purchasing department. For the finals, the team sacrificed the money left in the bank for the purchase of jackets so that two of their regular players, who were attending college in the United States,

could fly home to appear in the games. Front row: Jeff Jarram, Bob McDermott, captain Kevin Keith, Lionel Thoms, Mark Butler, and batboy Tom Roach; second row: Vince Goegan, Randy Chambers, Frank Iker, Dino Ortis, Rick Young, and Tim Burke; third row: Dave Goss, Danny Fallon, Deltrich Gyelko, Jim Martel, Steve Siba, and Billy Weaver; fourth row: coaches Mark Gibson and Larry Roach; missing: Don Di Bartolomeo.

Coniston and Levack tops in smoke-eaters' contest

"They're the hardest-working bunch of professional firefighters I've ever worked with, and I'm very proud of them all." That's how fire inspector Don Bray described the 29 Inco fire brigades entered in his annual competition, run off during September and October. It was the 23rd such competition since the first one was organized in 1946.

Practises for this year's competition began in May and the scores were all very close, indicating no walk-away victories.

Fifteen pumper and 14 non-pumper brigades were challenged by the simulated fire situations set up by Don, including a live fire for added realism which the non-pumper crews were timed in putting out. The pumper crews were timed connecting up their trucks to hydrants, and also on hose and ladder events. Proficiency in rescue and resuscitation techniques, and equipment identification were also counted in the results.

Scoring was calculated using a complicated timing system whereby competing teams were penalized a predetermined number of seconds for errors or delays in carrying out their procedures.

Non-pumper results

One second separated the winning non-pumper brigade,

the Coniston Cresswell crew, from the runners-up, Crean Hill Mine. The Cresswell squad's winning time was an incredible 31 seconds. The Coniston Stom team came third with a total of 37 seconds, then Garson Mine with 38 seconds; the copper refinery's brigades "B" and "C" tied with 45 seconds; Frood No. 1, 47 seconds; Clarabelle Open Pit, 48 seconds; Frood-Stobie Mill (Potvin), 49 seconds; Frood-Stobie Mill (Shaw), 50 seconds; Frood-Stobie Mill (Stoddart), 53 seconds; the copper refinery's "A" brigade, 54 seconds; Frood-Stobie Mill (Doucet), 56 seconds; and last year's champs, Coniston (Rivard), 64 seconds. The average score was 47 seconds.

Pumper results

The 15 pumper crews used an average of 201 seconds to complete their tests. Last year's second place team, Levack Town, came out on top in an old rivalry with Lively No. 1 team, the 1970 champs. It was the seventh time a Levack Town team has won. Levack's winning time was 141 seconds; Lively No. 1's was 165 seconds. Third place belonged to Creighton Mine again, with 166 seconds. Lively No. 2 was next with 173 seconds; then came iron ore plant (Pandke), 175 seconds; Copper Cliff Smelter (Brown), 208 seconds. Four teams tied with 220 seconds:



Reg MacNeil, assistant superintendent at Coniston, presented the shield to Bob Cresswell's squad, winners of the non-pumper brigade competition: Sid Kosiw, Keith Rafuse, Ron Ferguson (plant fire chief), Adalbert Hache, Reg MacNeil, Bill Coppe, Bob Cresswell (shift chief), Dan Nixon, and Bernie Laplante; kneeling are Agostino Pietrandrea and Gerry Turcotte. Absent when the photo was taken was Al Leblanc.

smelter (Shebeski), smelter (Rachowski), Copper Cliff Mill (Swant), and Levack Mine; followed by Copper Cliff Mill (McInnes), 226 seconds; iron ore plant (Jack), 234 seconds; Copper Cliff Mill (Bertrand), 235 seconds; Copper Cliff Mill (Lemieux), 243 seconds; and finally, iron ore plant (Morrison), 249 seconds.

Fire inspector Bray presented the championship shield to the Levack team and congratulated the winners for their hard work. He also thanked all the brigades for their interest and efforts in providing Inco plants with top-notch fire protection. Coniston's assistant superintendent, Reg MacNeil, did the honors for the Cresswell brigade.

St. John Ambulance honors Dr. Hazlewood

Dr. Brent Hazlewood, Inco's chief surgeon in Copper Cliff, was one of five local members of the Sudbury St. John Ambulance Brigade to be invested in the Order of St. John last month. Dr. Hazlewood was invested by Governor-General Roland Michener, prior of the order in Canada, at ceremonies at Government House in Ottawa.

Divisional surgeon with the local Brigade for the past 21 years, Dr. Hazlewood was honored for his "past service and continuing interest and support."

As divisional surgeon, he has given first aid instruction to hundreds of local St. John members, lectured on the St. John Ambulance first aid course, and presided over first aid examinations. He is also chief judge for the Parker first aid competitions amongst Inco plants.

Incorporated in 1914, the Order has five ranks: serving brother, officer, commander, dame of grace and knight of grace. Dr. Hazlewood was raised to a serving brother in 1968, two years after he received his priority vote

of thanks from the Lieutenant-Governor of Ontario.

Candidates for any of the awards are first recommended by their own local St. John Ambulance. This recommendation is passed to the chancellor of the prior of Canada, L. H. Nicholson of Ottawa. He examines the recommendations and then refers them to the Order of St. John's secretary-general in England.

At the Ottawa ceremony, Dr. Hazlewood was presented with a congratulatory letter from the Queen, and a medal which he is entitled to wear with his military service ribbons.

Besides his interest in the St. John Ambulance, Dr. Hazlewood is active with the Sudbury District Crippled Children Treatment Centre, the Ontario Society for Crippled Children, the Sudbury Rotary Club, the Copper Cliff Figure Skating Club, and the Medical Advisory Committee of the Ontario Mining Association. He is also a judge for the Canadian Figure Skating Association, and is the Sudbury district coroner.

These big grins belong to Levack Town, this year's pumper brigade champs. Back row: Roland Watier, Gaston Rousseau, Doug Teske, and Stan Plakoski; front row: Frank Charlebois, Gary Lacelle, and John Mallek (chief).



Couple celebrate 50th anniversary

Inco pensioner Albert Gagne and his wife, Laura, have marked another milestone in their marriage: on October 3, they celebrated their 50th wedding anniversary with a vow renewal ceremony and party at their Sud-



bury home. Over 200 people dropped in during the big day to congratulate them and wish them well. The three Gagne children organized the affair.

Gold diamond rings and close to \$300 cash highlighted the gifts the couple received.

Mrs. Gagne was born in Warren. At age 11 her family moved to Coniston where she and Albert were married so many years ago. Her father, the late Amade Guindon, worked for Inco at Coniston and Copper Cliff. Albert was born in Sudbury and has been there all his life—the Gagne home in Sudbury is situated on

land formerly farmed by Albert's father. Albert is 72 and Laura is 67 years old.

When Albert retired from the Company in 1959, he had just over 25 years' service. He worked in the Copper Cliff Smelter as a puncher and skimmer in the converter building. He also worked an 11-year period for the Mond Nickel Company at their Coniston Smelter.

68 Foster children

Although they have only three children of their own, the Gagnes have looked after 68 foster children since they opened their home to the Children's Aid Society beginning in 1947. They have 11 grandchildren and one great grandchild to date. A son, Alphonse, is maintaining the family's ties with Inco—he's a pipeman at Levack Mine.

Appointments

Toronto

N. W. Hayman, director, management services;

R. C. R. Park, director, personnel.

Copper Cliff

J. N. Lilley, manager of smelters;

R. G. Regimbal, manager of mills;

J. R. Feick, assistant manager of smelters;

H. B. Fowler, superintendent of mills;

S. Merla, superintendent of the Copper Cliff Smelter.

Port Colborne

W. Kantymir, assistant superintendent, electrolytic refinery.

96 years young — that's Bill Cook

"Well, I don't get around as much as I used to", said William "Bill" Cook, who, at the ripe old



age of 96 is Port Colborne Nickel Refinery's oldest pensioner. Up until five years ago, Bill was a familiar sight pedalling about town on his bicycle. At the age of 80, he was still riding to Dunnville to visit—a distance of 25 miles. "I've never owned a car," he said proudly, "never had any need for one".

Bill was born in St. Catharines, Ontario in September 1875. He joined Inco in April 1923 and retired in April 1944. Sports has always been his main interest and until two years ago, he attended all the local hockey games. Now, he is content to follow his favorite baseball and hockey teams on TV.



Earle H. Kingsland

Up, up, and away: Austin Force's first test flight in his homebuilt airplane. A year ago, a Triangle article showed the airplane still under construction.

Port's "Red Baron" takes to the air

Culminating two years of patient, enjoyable work, Austin Force realized his fondest dreams when he finished building his own aeroplane and took to the air for the first time last month.

The parasol-winged type plane was designed about 1930 by Bernard Pietsenpol in Minnesota. It is powered by a 65 hp engine and will cruise at 90 mph for 3½ hours. The little open-cockpit two-seater sports job has a wing spread of 29 feet.



Austin Force repairs an electrolytic cell in the Port Colborne tankhouse.

The wings and fuselage are built of strong Sitka Spruce, and Austin added a sheathing of plywood to the fuselage. Over the top of both went a covering of Grade A cotton, and nine coats of cellulose dope.

Austin has been a Port Colborne Nickel Refinery employee for over 30 years, working in the electrolytic department.



Austin Force

Chess flourishes in Copper Cliff



Mike Taseski, general engineering, studies a move in the speed chess championship held at the Copper Cliff Community Club, Nov. 10. Mike, who holds an "expert" rating from the Canadian Chess Federation, played 18 games simultaneously, losing only one to Julius Szigeti, also of general engineering. Ten students from Copper Cliff High competed in the event. Mike was also tournament director for the engineering department's chess tournament run during October. The six teams played 20 matches, with the champions being Julius Szigeti's mechanical design 1; runners-up were Robert Byrnes' estimating and pollution control, and Alf Koehn's civil design teams.

Early Days of Motoring Live On in Nickel Belt

To the 40 members of the Nickel Region Antique Car Club, happiness is being behind the wheel of an old car they've restored themselves. A restorable "wreck" may cost \$100 or \$200 to buy from its owner, usually another enthusiast, or from a scrap dealer, but sometimes a car is found abandoned in a swamp or by the side of a back road.

Once restored, however, few owners can bear to part with their handiwork. Eldon Ginson refused a 1971 Cadillac in even exchange for his 1929 Packard; and when Model A Fords change hands, assuming you can catch an owner in a moment of weakness, the average price is over \$2,000.

Any car that is 30 years or older qualifies as an antique. "Classics" generally include the big Cadillacs, Cords and Stutz of the 30s. Rare already and best bets for future classics are the Silver and Golden Hawk Studebakers, the Desoto, the Edsel and the Corvair window van.

Research Car Lore

Most of the members ferret through old magazines and newspapers for car ads, and collect old books, brochures and parts lists about their cars. They reminisce at meetings about such machines as Whippets, Stars, the Brush roadster, Gray Dorts, and McLaughlins—examples of which are owned by club members.

Romance aside, the research has a practical value because a restorer must be able to pick out the parts he needs from old wrecks. When Ed Yates began rebuilding his 1931 Ford Model A pickup, he was unaware that Ford changed the truck box near the end of the model year. Because of this, the rear fenders and the tailgate are unique and don't fit other Model As. Ed recovered most parts from wrecks he scrapped personally and it was a chance clue in an enthusiast's

magazine that put him on the right track in rebuilding his Model A, which is one of only 14 registered with the Antique Car Club of America.

Restoring a car requires skill, money, and patience. The time spent rebuilding depends on the shape of the wreck the restorer started with, and his success at scrounging, buying or making parts. Some parts are particularly rare, such as spare tire covers, cowl lights, and the "motor meter" for the Model A Fords. The latter device sits on top of the radiator and visually indicates the water temperature; originals are almost impossible to find, and most restorers purchase replicas costing \$30.

Special License Plates

In Ontario, owners of antique cars can obtain special license plates denoting their cars as historic. These cost only \$10 annually but restrict the car to demonstration drives and to travel to and from club meetings and activities.

All cars owned by members of the Historic Automobile Club of Canada, with which the local club is affiliated, must pass a safety test before they are registered with the parent club and driven on the road. Few of the old cars can meet the standards required by the province's mechanical fitness test, but the club inspection ensures that the vintage car is safe according to the standards of its year of manufacture.

Regular meetings of the local club are held monthly during the winter and spring. Workshop sessions on restoration problems, parts trading, and the exchange of information usually make up the agenda. During the summer and fall, family picnics and weekend camping trips are held at Deer Lake and Manitoulin Island. Errol Dawdy, president of the Nickel Region Club, said new members are always welcome and ownership of a car is not necessary. His phone number is 674-4109.



Eldon Ginson, Garson stoop leader, answers questions from Model A owner Ed Miller, Copper Cliff maintenance mechanic, about his 1929 Packard. Weighing 4,500 pounds, it cruises at 50 with only 32½ hp.



Ed Yates, smelter maintenance electrician, polishes his gleaming Ford Model A pickup, the product of seven years' work. Worth \$2,000 today, it cost \$395 new in 1931.



Besides this 1937 Dodge, Bill Charsley, Garson mechanic, has a 1927 Ford touring sedan and a 1935 V8 Ford coupe, both of which he is now restoring.



Richard Morrison, IORP process technology, tells Henry Liot, IORP process technology, and Steve Moorhouse, smelter time office, how he found his 1931 Model A roadster while working in Port Colborne.



Garson driller Connie Cyr's highly polished 1947 Chrysler is considered a "classic". It has gone only 43,000 miles and is still worth over \$1,000. He's now restoring a 1936 Chrysler.



George Quackenbush of Capreol casts an eye over his 1914 Chalmers "horseless carriage", worth \$15,000 and the most valuable car in the local club. Tires for the car cost \$80 apiece to replace.