

HANDSOME NEW THEATRE IN TIMMINS



Explaining the Reason Why the Talkies Talk

Sound System at the Broadway Theatre Explained by Manager L. Moore. New Theatre Specially Designed and Equipped to Assure the Best Results.

Glamorous human creatures flit back and forth across a large silver sheet, their faces wreathed and contorted in the entire gamut of human emotion, and as they speak, millions of auditors gathered in hundreds of motion picture theatres sit spell-bound. A shattering, thundering, earth-shaking catastrophe is pictured on this same silver sheet and these same millions gasp, shudder and cringe as they live through the terrifying experience in the safety of their plush covered seats. All the stirring, startling, soothing, rasping, thrilling sounds that constitute the audible phase of human emotions and situations are faithfully reproduced in the modern motion picture with such realism that we, the auditors, literally enlarge our experience by living through them. That is the modern miracle of motion picture sound.

Only an insignificant minority of the millions who thrill to the realism of motion picture sound have even a vague notion of how this modern miracle is produced. Yet, according to Mr. L. Moore, manager of the new Broadway Theatre, the public is not without a great deal of curiosity on this subject. Years of listening to radio, to public address systems and to motion picture sound have made them discriminatingly critical of the difference between good and bad sound, he said. For this reason that the management of the Broadway Theatre recently asked the engineers from the great RCA Victor engineering laboratories to install their latest achievement in sound motion picture reproducing systems. This sound system has been named the "Magic Voice of the Screen" because of its remarkable capabilities. "It is surprising," said Mr. Moore, "how many people will ask 'What makes the talkies talk?' The process is extraordinarily interesting and not as hard to understand as one might suppose."

To begin with, the sound you hear in the theatre comes from a narrow strip of "sound-track" which runs parallel to the pictures on the film. This sound-track has a curious fluctuating pattern which varies in accordance with the pitch and volume of the sound. Now, actually, sound cannot be photographed, so what the recording engineers do is to convert the sound waves of the singing or speaking voice, or of music and background effects, into electrical waves and then into light waves during the recording process.

"This sounds much more complicated than it is. But to put it simply this is how it's done. The motion picture studio is a good deal like a radio studio. The sound is first picked up by a microphone which converts the sound waves into corresponding electrical waves very much the same way as the telephone receiver does. The electrical waves are then amplified to sufficient strength to make them vibrate a tiny mirror. These vibrations correspond exactly to the characteristics of the original sound waves. A bright light is then focussed on the mirror so that its vibrating reaction strikes the film negative. Now we have the light waves which can be photographed—and the wavy fluctuations on the sound-track are the result.

"The reproducing process in the theatre is simply the reverse of the recording process," continued Mr. Moore. "The film is threaded into the projector and the motor started up. The film then moves at exactly the same speed at which it was recorded. A beam of light is then directed through the sound-track portion of the film. The variations in the sound-track picture cause variations in the amount of light passing through the film. This fluctuating light is focussed on a photo-electric cell.

"The photo-electric cell is a marvelous little device resembling a radio tube which is often called an 'electric eye' because of the many miraculous things it can be made to do. This photo-electric cell is extraordinarily

sensitive to light and as the light waves strike it, it regulates the flow of electric current in exact proportion to the amount of light passing through it. The electric current thus produced is built-up in volume by amplifiers and made to operate the loudspeakers, which are situated behind the screen. The screen itself has tiny perforations to permit the unimpeded flow of sound from the speakers and yet present a smooth reflecting surface for the projection of the picture. Thus we have, in a few seemingly simple, but in reality highly critical stages, the miracle of the modern sound motion picture," concluded Mr. Moore.

General A. G. McNaughton Makes Appeal to Youth

London, June 18—Lt.-Gen. A. G. L. McNaughton, commander of Canada's army overseas, appealed to the Dominion's young manhood last night to enlist for active service.

"Under our voluntary system of recruiting," he said in a broadcast message to Canadians, "a grave responsibility rests with the individual. Accept that responsibility, and come forward for enlistment now."

He described how mechanization had become the dominating factor in army composition and declared the Canadian educational system had fitted Canadians particularly well for this type of fighting.

"You have a higher level of intelligence and initiative than the enemy," he said. "You have that spirit of co-operation or team play which is essential and in physical fitness and endurance you need defer to no one."

Gen. McNaughton said there was "full scope for every conceivable kind of talent in the modern Canadian army and young men should not hesitate to offer their services because the Empire could not afford to lose a 'single day.' "These matters are urgent," he said. "The German armies sprawl out across Europe . . . and sooner or later, action is bound to come in this, the one decisive theatre of war."

He traced Canada's transition from a peacetime to wartime footing. "At the outbreak of war many volunteers had to be turned away," he said. "But now industry has passed through the transition stage from a peacetime to a wartime footing and already is well advanced."

Gen. McNaughton gave a brief description of the modern army, with its wide range of scientific devices and modern improvements. These improvements were not "luxuries but absolute necessities—antidotes to some specific danger" which the enemy might bring into play.

"When the history of this time comes to be written, and comparisons drawn between the nature of the armed forces placed in combat in 1914 and the present time, the fact which will stand out is the increase in mechanization," he said.

Medical Aid Plan Now in Effect at Kirkland Lake

Reference was made recently to the Medical Aid plan proposed by the Kirkland Lake Mines. According to the following from the last issue of The Northern Miner, the plan is now in full force and effect, with a majority of the mines at Kirkland Lake putting it into effect on June 1st. The Northern Miner says:—

Pictured above is the imposing new building which houses the beautifully equipped new theatre, "The Broadway" to open to-morrow (Friday) with the performance "It's In the Air" starring George Formby. The marquee of the entertainment palace is brilliantly lighted, and the building is made in the newest of modern architecture.

Lake. The plan covers all regular employees of the mines, their wives and dependent children under 18 years of age. The cost to married employees is \$2.75 per month and for single employees \$1.75 per month.

The plan covers the cost of medical and surgical services in cases of sickness or accident except in cases subject to the Workmen's Compensation Act. The Public Health Act, the Venereal Diseases Act or any other public body or agency. It does not cover treatment of drug addicts, sufferers from venereal diseases, alcoholism or any illness or disability resulting from these conditions, or illness or accident incurred while offending against the Criminal Code.

Specialists, when authorized by the attending physician, will be provided under the plan and consultant service, other than specialist, will be provided by the attending physician at the request of the employee. Necessary hospital accommodation will be provided at the discretion of the attending physician. Hospital care includes x-ray and private nursing service when ordered by the attending physician and is limited for any one illness or accident to 45 days in the case of an employee and to 21 days in the case of an employee's dependent. Drugs and medicines, consisting of sulfanilamides, codeine, aspirin and cough medicines will be supplied free by the physician. Drugs and medicines supplied in hospital on prescription will also be free under the plan. In obstetrical cases cared for in the home the sum of \$10 will be allowed for graduate, including V.O.N. nursing service. If hospitalized the sum of \$20 will be allowed toward the hospital charges, the balance being payable by the employee. A nominal fee of \$12.50 will be payable by the employee to the attending physician. In the case of contagious diseases medical service will be provided in the home. Tuberculosis and mental diseases, after diagnosis, are not covered by the plan.

Choice of doctor provides that an employee may select his physician and the physician for his family from a list of 21 doctors who have been selected to participate in the plan. The low rates for the plan have been established on the basis of one physician for the employee and his family. If an employee desires to name a physician for himself and another for his family a charge of 50c a month will be made in addition to the regular charge for a married man unless the doctors selected are in the same group. On the first of each month an employee may change his doctor by lifting his card from one doctor and placing it with another and giving notice to the mine office.

Expect Victory Loan in Canada to Reach Objective To-morrow

Word from Ottawa last night suggests that headquarters for the Victory Loan are confident that the drive will pass its objective by to-morrow (Friday) that a little over fifty-one million dollars is all that is required to put the loan over the top. With three days to go and several large subscriptions yet to be sent in, the final victory for the Victory Loan seems assured.

The following telegram was received yesterday by The Advance. Ottawa, June 18th, 1941 Canada's 1941 Victory Loan should reach its minimum objective by Friday, if the present rate of progress is maintained. The total up to Tuesday night stood at \$538,773,000 from 603,088 individual subscribers. National headquarters will not be satisfied with the nominal objective. Canada's Torch of Freedom must go to Winston Churchill, but let us make it go handsomely. G. W. Spinney, national executive chairman, said in a message to his field forces.

—Dominion Publicity Committee

Census Enumerators are Busy at Work in District

The activities in connection with the Victory Loan have perhaps put the less spectacular work of the census-taking in the shade. Sheriff John D. Mackay,

of Cochrane, is the head of the census work for the District of Cochrane, and has the work thoroughly organized all through the district. The taking of the census is a big undertaking with many difficulties. There may be difference of opinion as to the necessity

for taking the census this year in view of the cost and the general war situation, but there can be no honest difference of opinion as to the co-operation that should be given by all in view of the fact that the census is being taken and that every assistance

should be given to the enumerators. The enumerators should be given friendly welcome and every possible help and co-operation. They have a difficult task and are giving it the best effort and talent and so deserve the goodwill as well as the ready assistance of the general public.

BROADWAY
DELUXE SHOWPLACE OF TIMMINS

Opens Its Doors Tomorrow Friday, June 20 at 6.30 p.m.



What A RECEPTION!

Britain's Ace Comedian Will Take The Town By Storm

Critics acclaim George Formby as the comedy "find" of the year. Record-breaking audiences have rocked theatres with laughter everywhere. The Broadway is proud to present this great comedy to the theatre-going public of Timmins.

8 Weeks In Toronto



"You'll Enjoy It Too in The New Broadway"
STARTS FRIDAY, 7 p.m. FOR ONE WEEK

ALL SEATS OPENING NIGHT
40c plus 8c tax = 48c

GEORGE FORMBY
"It's in the Air"



Watch Future Announcements For Our Parade of Hits!

NEW THRILLS . . . Come to this theatre to get all the pleasure of motion pictures. We have just installed the amazing new RCA Photophone "Magic Voice of the Screen" Sound System that will double your enjoyment of the great pictures we have coming.

Luxurious Surroundings Are Broadway Features