Pittsburgh in the Great Epidemic of 1918

by Kenneth A. White

S the shrill sounds of reveille cut across the predawn darkness of Fort Riley, Kansas, on March 11, 1918, Private Albert Gitchell, United States Army, awoke feeling terrible. His head and muscles ached, his throat was sore, and the chills that accompany high fever wracked his body. Too sick to eat breakfast, he dragged himself out of bed and went directly to Hospital Building 91. The duty corpsman had just noted Gitchell's symptoms and gotten him to bed when Corporal Lee W. Drake appeared with the same complaints. Behind him came Sergeant Adolph Hurby, followed by two more men. By noon 102 more soldiers had joined the procession to the hospital.

This marked the beginning of the worldwide epidemic of Spanish influenza in 1918. Like a runaway freight train, it burst on the world scene without warning, spreading death and misery in its wake, only to disappear as quickly as it had arrived. In less than one year, influenza killed an estimated twenty-one million people — twice the number of men killed in World War I. Pittsburgh suffered along with the rest of the world. During the two months that the epidemic held sway over the city, more than twenty-two thousand Pittsburghers caught the disease and more than forty-five hundred of them died.

Yet at first it seemed as if the disease would be no more than a minor event quickly forgotten in a world at war. During the spring the disease stayed in the army camps and seemed to have burned itself out. However, the transports that carried the American Expeditionary Force to Europe also brought the influenza virus. As if invigorated by the ocean voyage, the flu struck the war-devastated populace of Europe with redoubled fury. From France the disease spread rapidly throughout the continent. The Royal Navy quickly found itself with

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¹ Actually, no one can say for certain where the epidemic started. A. A. Hoehling in his work on the Spanish influenza accepted the Kansas theory that I have repeated here. It is possible, however, that the epidemic began in the Orient. Despite its name, the disease did not originate in Spain. Why it was called Spanish influenza is not clear. Perhaps it was because the Spanish introduced influenza into the New World in 1647. A. A. Hoehling, The Great Epidemic (Boston, 1961), 14-15.

10,313 cases of the flu; the virus knocked the German Fourth and Sixth armies out of the line in France. By July the disease had reached China and Japan. A month later, influenza made its return to the United States. By the end of August the East Coast was aflame with influenza and it had begun to spread westward.

Throughout most of this time, the residents of Pittsburgh managed to ignore the growing epidemic. The *Pittsburgh Press*, for instance, preoccupied with the war, a summer heat wave that caused a severe ice shortage, and the Pirates' unsuccessful attempt to catch the Chicago Cubs in the pennant race, made no mention of the epidemic until mid-August. But like an unpleasant neighbor, the flu began forcing itself on the consciousness of the city. By mid-September influenza stories began appearing in the *Press*. On September 16, Dr. Philip E. Marks, superintendent of the city's Bureau of Infectious Diseases, issued a warning:

The attack of the disease is almost always sudden. It begins with a chill, severe headaches, pains in the back, a general feeling of tiredness, flushed face, some soreness of the throat, and a fever from 101 to 104 degrees with a rather slow pulse. . . .

The best treatment is to go to bed, observe a light diet, and keep the bowels open. The spread of this infection would be materially limited if the public would exercise care to avoid spitting in public places and to invariably cover the mouth and nose with a handkerchief when forced to cough and sneeze. Any member of the family developing a cold should be isolated. Crowded street cars, poorly-ventilated offices, and close rooms at home should be avoided.²

Yet, until October 4, the disease remained someone else's problem. Two events that day shattered this complacency: the arrival of the flu and the arrival of an order by acting State Health Commissioner B. Franklin Royer to close all places of amusement in the state. Of the two, the order by Royer caused the most consternation. Only sixty-three cases of the flu appeared on the fourth, and all were among members of the military in training in the city.³ As military officials

² Pittsburgh Press, Sept. 16, 1918.

³ The figures for new flu cases and deaths come from the bureau of infectious diseases as reported in the Pittsburgh Post and the Pittsburgh Dispatch. As the bureau closed at 4 o'clock in the afternoon, these figures actually represent the numbers reported in the twenty-four-hour period ending at closing time — for example, the figures for October 9 cover the period from 4 o'clock October 8 to 4 o'clock October 9. Two additional problems remain with the new case figures. They indicate when the cases were reported, not necessarily when they occurred. At times doctors were too busy to turn in their reports on time. Also, the bureau remained closed on Sundays and issued no reports for that day. To complete the graph, I took the number of cases for the forty-eight-hour period Saturday to Monday and divided it in half.

had taken steps to handle the situation.4 Rover's drastic action seemed unnecessary. The order closed 1,400 saloons in the county, 165 motion picture houses in the city, all theaters and vaudeville houses. It cancelled college football games and banned public funerals and the visiting of the sick except those near death. It also gave local health officials the authority to close schools and churches whenever they felt it was necessary. While most of the city's newspapers reluctantly urged citizen cooperation, the Pittsburgh Leader spoke for most people in its front-page editorial:

Every man who has been given power recently seems to try to use it to an extent far beyond the intention of the act giving him authority. It may be that the newspapers are partly responsible for this, because when an order is issued that is drastic or freakish, they immediately give the author of it considerable notoriety and he at once imagines that he is a great man.

It is sadly true that in democracies, when a man is given power, he usually out-autocrats any autocrat in the world.

The order of Dr. Royer closing the theaters and all public places may be

all right, but did Dr. Royer know this when he made it?

Without any consultation with local authorities or without any knowledge of the situation here, he issued an order affecting this city because there was an epidemic in Philadelphia. With issuing this order to close public places, he issued no order for fumigation or any other preventive and probably the only thing that will result from it will be that many people will be deprived of what are their rights under ordinary circumstances and no great good will be accomplished.5

While the editor of the Leader wrote this fiery denunciation, Charles N. Patterson, twenty-nine, of Aspinwall, lay dying in St. Francis Hospital. His was the first known death from Spanish influenza in Pittsburgh.6

Although the order from Royer caught the mayor of Pittsburgh, E. V. Babcock, as much by surprise as the ordinary citizen, he moved quickly to implement it. He called a meeting of local health officials, confirmed Rover's order, and instructed the police to enforce the

⁴ On the night of October 3, the army took over the second floor of Magee Hospital for the care of flu victims. The army command issued orders that any soldier who experienced flu symptoms must report to the medical officer. Ambulances were kept on standby to convey flu sufferers immediately to the hospital. On October 4, the campuses of the University of Pittsburgh and Carnegie Institute of Technology, where military training was taking place, were quarantined. Within a week the army took over all of Magee and West Penn hospitals. They cared for men in training, soldiers home on leave, and those passing through the city in military convoys.

⁵ Oct. 5, 1918.

⁶ Patterson's death was probably not the first from influenza. Deaths from pneumonia jumped greatly during the month of September, from four the first week to twenty-two the last week. The rise may have been caused by flu victims not seeking medical help until after pneumonia had set in.

saloon closings. He decided against closing schools and churches, although the health department requested that all religious services be cut as short as possible and that anyone coughing or sneezing be banned. Schools also received instructions to send any sneezing or coughing student home. To keep track of the disease, the health department ordered doctors to report all cases of the flu. In addition, the police received orders to "arrest all persons expectorating on the sidewalks, in the street cars, incline cars, railroad cars, or any other places." Failure to obey these orders would bring a \$100 fine, a month in jail, or both.

That same day A. K. Oliver, chairman of the Pittsburgh chapter of the Red Cross, called on all graduate nurses, practical nurses, and nurses' aides to register to fight the epidemic. However, this call was not for them to work in Pittsburgh but rather in Philadelphia. This highlights one of the major problems of the epidemic, the lack of trained medical personnel. The war had drained doctors and nurses away to the battlefields, leaving many communities dangerously shorthanded. For example, East Brady soon found itself with more than three hundred cases of the flu and only one doctor to treat them. Some small mining towns had no doctor at all. Illness among medical personnel soon aggravated the situation. On October 5, for example, eleven army medics preparing a convalescent hospital for flu victims became ill themselves. Others, like Allegheny General Hospital nurse Florence Hutchman, twenty, of Mars, died after contracting the disease from her patients.

Medical ignorance as to the cause and cure of influenza added another complication. Most medical advice seemed to center on keeping the bowels open and getting plenty of fresh air. Otherwise, each doctor had his own opinion of how the disease should be treated. Drug companies did their best to stock up on supplies but noted that "there would be a greater reserve supply on hand were there any certainty as to the particular weapons with which the medical men will come to fight the disease." 8 Some doctors used quinine, others coal tar products, gum camphor, or opium derivatives. Professor Henry F. Smith, a bacteriologist at the University of Pennsylvania, suggested that people dissolve a teaspoon of salt in water and gargle with it twice a day, get plenty of fresh air, and when the symptoms first appear, take a hot footbath, hot lemonade, quinine, and stay in bed a full day. Dr. Adolph Koenig, Allegheny County medical supervisor,

⁷ Pittsburgh Post, Oct. 5, 1918.

⁸ Ibid., Oct. 7, 1918.

suggested gargling two or three times a day with a tablespoon of salt and one of baking soda in a glass of water. Should the unfortunate flu victim develop pneumonia, the United States Surgeon General, Rupert Blue, had a sure cure:

Saturate a ball of cotton as large as a one-inch marble with spirits of alcohol. Add three drops of chloroform to each ball of cotton. Place it between the patient's teeth. Let patient inhale the fumes for 15 minutes, then rest 15 minutes, or longer, if needed. Then inhale again 15 minutes and repeat the operation as directed 24 times.

The result will be that the lungs will expand to their normal condition. In 24 hours the patient is out of danger. Change cotton often. It ought to

be changed twice in 15 minutes.9

The medical world offered equally bizarre preventive measures. Brigadier General Charles Richard of the army's Medical Corps provided a list of suggestions that included breathing through the nose, chewing food well, and avoiding tight clothes, shoes, and gloves. Dr. Koenig recommended that people avoid alcohol and eat and drink moderately. Doctors in industrial plants offered workers free salt-andsoda gargles, ordered disinfectants sprinkled around the work stations of men who got sick, and had newspapers hung between beds in company bunkhouses. To prevent the spread of the disease in Magee Hospital, linen or heavy paper screens were placed between the beds. Many doctors recommended that people wear gauze face masks at all times; however, other doctors denounced the practice. This conflicting advice led one newspaper to editorialize:

There is more than a mere grain of truth in the statement of a Boston paper that there is nothing in the current epidemic that can be twisted into a compliment for the medical profession. . . . The doctors know little or nothing about the causes of the disease, according to their own admissions. The terminations are rather severe comment upon what they know about treating it. The unprofessional mind might conclude that doctors who know nothing of a disease's cause, effective methods of checking it, and little about how to treat it, might be less profuse in prophecies about what is to come.10

Doctors did not know then that influenza is caused by a virus so tiny that twenty million could easily fit on the head of a pin. A gauze face mask could no more prevent the passage of the virus than a screen door can prevent the passage of a summer breeze. As for newspaper and linen screens, authorities might just as well have posted "no germs allowed" signs for all the good that they did. Loose shoes, saltwater gargles, and breathing through the nose provided no protection.

⁹ Pittsburgh Leader, Oct. 19, 1918.

¹⁰ Ibid.

Not surprisingly, this medical futility led people to try their own homemade remedies. One writer to the *Pittsburgh Post* claimed that red peppers sliced in half-inch strips lengthwise and eaten in a sandwich twice a day would burn out coughs, colds, and fever. Mrs. Mary Copely Thaw of Cresson offered her own cure: "To put euolioil or carbolated vaseline on cotton and insert in the nostrils is often a preventive . . . before doing so the patient should gargle and snuff up, as far as possible, a solution of glycothymolin or Pond's extract, diluted with water, as a rule hot. Keep warm and quiet, with light, wholesome diet." ¹¹ Many citizens thought that sprinkling sulphur in their shoes every morning would protect them from infection.

Not far behind the amateur doctors came the makers of patent medicine who smelled a profit in the epidemic. They quickly discovered that their miracle cures not only cured indigestion, constipation, tiredness, weak blood, and poor kidneys, but influenza as well. One advertisement claimed that the best treatment for the disease consisted of bed rest, open bowels, a light diet, and many cups of Bulgarian Blood Tea, made from "an old Bulgarian Formula." 12 Father John's Medicine, "the old-fashioned wholesome body-builder," 13 prevented flu as did Father Mollinger's Health Tonic for the stomach and liver. Nostriola cleaned the air passages in either balm or liquid form while Nu Vim Weed Tonic purified the blood. Dr. B. H. Jones in the May Building proved to be a medical pioneer, for he alone knew that coughing and sneezing did not spread flu, but rather that "an irritation of the stomach, producing inflammation in the respiratory tract" caused the disease. For sufferers, he offered the Jones-Cook-Rose System of Drugless Therapy.14

Even legitimate businesses got involved. The manufacturer of the Duquesne Electric Vacuum Cleaner warned that sweeping with a broom stirred up "germ-laden dust." ¹⁵ The Family Dentists on Smithfield Street contended that clean teeth and gums would prevent infection. The Pittsburgh Natatorium suggested their Turkish Baths as a way to avoid influenza.

Notwithstanding the medical confusion, Mayor Babcock and his advisors — health department Director William H. Davis, Superintendent of the Bureau of Child Welfare H. J. Benz, Superintendent of

¹¹ Pittsburgh Sun, Oct. 18, 1918.

¹² Pittsburgh Press, Sept. 17, 1918.

¹³ Ibid., Sept. 18, 1918.

¹⁴ Pittsburgh Dispatch, Oct. 5, 1918.

¹⁵ Pittsburgh Post, Oct. 11, 1918.

the Bureau of Infectious Diseases Dr. Philip E. Marks, and Director of the Department of Charities John J. McKelvey — moved quickly to contain the epidemic. On October 5, the health department closed all swimming pools, poolrooms and billiard parlors, and ordered a strict inspection of all soda fountains. Davis further decreed that all streetcars had to be disinfected at least once a day and that all windows and vents on the cars had to remain open. Police officers posted signs on all churches stating:

NOTICE

Any person having a cough or cold is not permitted to enter this Church.16

Yet despite all this official concern, Pittsburghers did not seem to take the epidemic seriously at first. Streetcars in particular became a battleground between conductors and passengers. When Davis ordered that all streetcar windows remain open, he obviously forgot about the weather. The rains came the same day that Davis's order did. Streetcar passengers, lacking the advantage of a medical education, failed to recognize the health benefits of getting soaking wet and immediately closed the windows. The conductors valiantly tried to keep them open, but as quickly as they raised them the passengers lowered them again. Riders who managed to stay dry faced another hazard if they rode the streetcars into the car barns. In a fit of zeal, the streetcar employees exceeded Davis's order by spreading disinfectant in the cars every time they entered the car barn. They used watering cans to do the job and sprinkled disinfectant down the aisles and between the seats whether or not those seats happened to be occupied. Many passengers left the barns secure in the knowledge that their sodden legs no longer harbored any living germs.

When the school district decided to remain open, the administration added a codicil that any student who sneezed or coughed in class be sent home. Enterprising students quickly discovered that a pinch of snuff or pepper, inhaled in school, provided a sure passport to freedom. Their parents also quickly responded to the new health regulations. Fearing that a ban on all sales of liquor would follow the closing of the saloons, Pittsburghers flocked to wholesale liquor dealers with "baskets, shopping bags, toy wagons, and small errand boys" 17 to

¹⁶ Pittsburgh Leader, Oct. 6, 1918.

¹⁷ Pittsburgh Dispatch, Oct. 6, 1918.

stock up. The foresight of those who moved fast was rewarded on October 8 when the health department closed down the wholesalers.

Any humor in the situation vanished quickly, however, as the number of flu cases began to skyrocket. The first four days brought 284 cases. Day number five, October 8, saw 453 new cases. The next day this number jumped to 784.

On Monday, October 7, the health department ordered all city hospitals to go on an epidemic basis. This postponed nonessential surgery and required hospitals to discharge all patients who could safely be sent home. This order freed 257 beds for influenza patients. That same day the mayor cancelled all church activities and closed the city playgrounds.

Davis met with the superintendents of the city's hospitals the next day. They agreed to form a committee to establish a unified control of the hospitals. Headed by Col. J. H. Bigger of West Penn Hospital, the committee consisted of Dr. J. M. Lawler of Allegheny General, G. S. Walker of Homeopathic, Sister Innocent of Mercy, Sister Laurentine of St. Francis, and Miss J. L. Jones of Southside. Their task was to ensure that hospital beds would be available when needed and to organize committees of civilians and physicians to combat the epidemic. Also on the eighth, Major Ewing Day of the army established a research lab at Magee Hospital, under the charge of Dr. Oskar Klatz and Dr. W. L. Holman, to study influenza and the best means to fight it.

The hospital committee moved to establish an emergency hospital or hospitals totalling 500 beds. With 1,687 reported cases, plus another estimated one thousand to two thousand unreported cases on hand, the committee feared that the hospitals would soon be overwhelmed. They considered the old Arsenal on Butler Street, the Hostetter Building on Water Street, and the old Public Safety Building on Sixth Avenue before deciding on October 12 to take over the Kingsley House which could hold 150 beds. On that same day the army commandeered the Concordia Club as a convalescent hospital for soldiers.

Local organizations pitched in to help in the crisis. When the flu arrived, the Red Cross offered all their resources to county and city health officials. Within the next two days, the Pittsburgh chapter had sent fourteen nurses and twelve nurses' aides to Philadelphia and three nurses to Magee. By October 8, the Red Cross notified Philadelphia not to expect any more help from Pittsburgh. The organization provided more than nurses. The influx of flu patients strained hospital supplies. On October 7, Magee Hospital requested immediate delivery

of bathrobes, pajamas, slippers, hospital robes, sanitary masks, blankets, and sheets, while authorities at the University of Pittsburgh called for 7,000 face masks. Once the hospital committee decided to form an emergency hospital, they asked the Red Cross for 3,000 sheets, 1,000 blankets, and all the beds they could find.

The Red Cross was not alone in lending a hand. The women's suffrage committee and the Y.W.C.A. organized sewing sessions to make face masks. The Volunteers of America conducted sewing sessions at their mission hall on Second Avenue and Smithfield Street under the direction of Staff Captain Anna Paris to make sheets and hospital suits for Magee. The University of Pittsburgh Medical School contributed sixty-three seniors and juniors to work as interns in flu hospitals where they joined 90 Red Cross nurses and 150 nurses' aides. Twenty more Pitt students answered Dr. Rover's call for volunteers and set off for Schuvlkill County.

Despite these efforts, the epidemic continued to get worse. The frightening thing about it was the lack of a discernible pattern. The disease struck as randomly as lightning. Neither age, wealth, nor social position offered any protection. Sixty-six-year-old Harmar Denny, one of the city's leading citizens, caught the flu while returning from a New England vacation and died in New York on October 8. Twentyfive-year-old Gillespie Lovene of Frankstown Avenue died on the seventh, and nine-year-old Ada Graham of Creighton died on the eleventh. Once the flu got its foot in the door of a house, it often ran through the entire family. Tony Amicene, his wife Martha, and all nine of their children caught it. Anna Keown of Broad Street tried to nurse her husband Everton and contracted the disease herself.

Trailing in the wake of the flu was pneumonia, the great killer of the epidemic. Few people actually died of influenza itself, but the disease was so ravaging that pneumonia often set in; the victim then had no bodily resources to fight back. Pneumonia attacked people's lungs, which slowly filled with fluids and left them desperately gasping for air. Eventually their skin began to turn blue from oxygen deprivation and they literally drowned in their own juices.

Meanwhile the flu kept spreading. On October 5 Ben Avon closed its schools, while Ambridge reported 100 cases and four deaths. Greensburg suffered its first influenza death on October 7 when high school senior Mildred Sowash died. By the eighth the flu had spread to Tarentum, Brackenridge, and Natrona Heights. Two days later, the army took over Mercy Hospital and promptly sent it 302 patients. On Thursday the tenth, medical authorities warned the people that the flu was travelling westward at the rate of 100 miles a day and that the terrified locals could expect the crest of the disease to arrive on Tuesday the fifteenth.

Emergency hospitals began springing up all through the county. The city of Pittsburgh formally took charge of Kingsley House on the twelfth. That same day the military took over the Concordia Club, Sewickley set up an emergency hospital in the Presbyterian Church, and Edgeworth established a hospital in the auditorium of the public school.

As the fifteenth approached, the city braced itself for the expected crisis. The authorities worked feverishly to ensure that the Concordia Club and Kingsley House would be ready to receive patients that day. Dr. Royer ordered the halt of liquor sales with meals, which meant that alcohol could only be obtained at a drugstore with a doctor's prescription. He also sent Dr. Karl Schaffle, just returned from studying the epidemic in Massachusetts, to "enforce precautionary measures in and around the industrial settlements" ¹⁸ to prevent the closing of plants vital to the war effort. In preparation for this, Royer gave the city power to handle the epidemic in the western part of the state. Dr. Koenig, county medical supervisor, began to form a reserve of doctors to work in communities without medical help. His first act was to send Dr. H. C. Diltz of Wilkinsburg to East Brady. Within twelve hours of arrival Diltz treated 100 patients.

Health director Davis continued to urge flu patients to stay home rather than overtax the hospitals. This, however, brought additional problems. Families in which every member came down with the disease had no one to cook or care for them. To remedy this, the Red Cross began providing hot meals for those homes. Worried about the poor, who might not be able to get medical help, John J. McKelvey, director of the department of charities, kept his ten doctors busy visiting the poverty areas. In one house in the Twentieth Ward, a doctor found an entire family in desperate straits. The father had died of influenza. The mother, sick with flu, had given birth to a baby which had immediately died, while the other five children all had the disease. The six surviving members were immediately transported to St. Joseph's Hospital. Unfortunately, McKelvey's understaffed department faced an additional shortage as Dr. Grant J. New caught influenza.

The city made plans on the fourteenth to set up a 300-bed tent

hospital on the Washington Park playground and fit additional beds in the recreation center there. This, combined with Kingsley House. would provide space for 600 patients. Following the medical wisdom of the day, city authorities decided to house the flu patients in the tents to give them plenty of fresh air - despite temperatures that dropped as low as the thirties — and reserve the buildings for surgery and pneumonia cases. The state aided in the project by sending sixty hospital tents, each with a capacity of eight.

Predictions that the flu would crest on the fifteenth seemed vindicated when the number of new cases reported reached its highest total to date — 813. Already the city's medical resources showed signs of strain. The Allegheny County Medical Society called on specialists to devote several hours per day fighting the flu to relieve the exhausted general practitioners. The society hoped to set up a zoning system, with each zone having a police or fire station designated as a clearing house for calls for assistance. The specialists would then check in periodically to collect the calls on file.

The community pulled together in the crisis. 19 The Twelfth Ward Hunting and Fishing Club donated their tents and cooking equipment to the health department. The Moose Club offered its building in Beechview for an emergency hospital. The Allegheny County commissioners turned over the old county court building at Fifth and Ross streets to the city for an emergency hospital, while the Pittsburgh Street Railways Company agreed to sprinkle water on the streets to cut down on dust. The Carnegie Steel Company bought enough vaccine²⁰ to inoculate all 20,000 of its employees.

Yet nothing seemed to slow down the epidemic. H. P. Drake arrived in Pittsburgh on the sixteenth to supervise the water and sanitary

¹⁹ Unfortunately, not all Pittsburghers shared this community spirit. The Red Cross issued a call for 300 nurse volunteers in mid-October and got eight. Their request to people who employed private duty nurses to release them for use in the crisis fell on deaf ears. On October 11 police arrested two men selling "flu killer" at four dollars a bottle. The county medical society received complaints that some doctors were charging as much as fifteen dollars for a flu inoculation. When Mabel Merriman, twenty-four, of the North Side, who lived alone with her bed-ridden mother, died, neighbors offered to make burial arrangements They went to one undertaker, "but when he was informed that the people had no money and that the girl was the only support of the mother, he refused to handle the case." Pittsburgh Sun, Oct. 25, 1918.

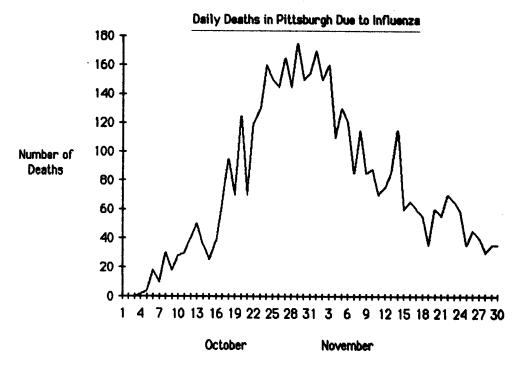
²⁰ Some question exists as to the effectiveness of the vaccine. Proponents claimed great results from the practice. Logic dictates, however, that these claims be treated with skepticism. If no one knew what caused the disease, how could anyone find a means to immunize people against it?

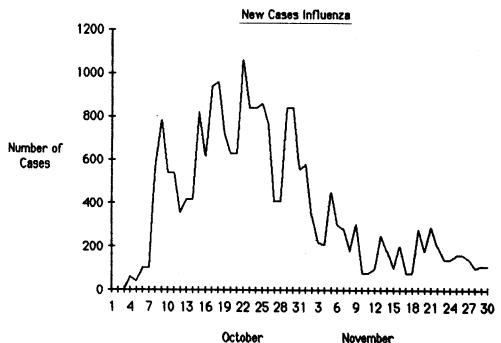
facilities for the emergency hospitals and described conditions in the coal mining areas as "desperate beyond belief." ²¹ By October 16 drug wholesalers began to close as they could no longer keep up with the demand. According to the Pennsylvania Retail Druggists Association, prescriptions had risen 500 percent to 800 percent in the prior two weeks. That no one knew the best way to deal with the epidemic aggravated the situation. This confusion was illustrated on October 15 when Mifflin Township and McKees Rocks closed their schools to protect their students and Braddock reopened its closed schools for the same reason.

The slight dip in deaths that occurred on Monday the fourteenth soon reversed itself. Thirty-nine people died on the fifteenth, sixty-nine on the sixteenth, and seventy-five on the seventeenth. Behind these cold numbers lay very real human tragedy. Agnes Sheridan of Cleveland came to Pittsburgh to visit her family and died as a result. Chalmer S. Miller of Schenley Farms Terrace survived the Spanish-American War but not the flu. All of Dr. Koenig's medical skills could not save his twenty-year-old son Eugene. The funeral of Mary Cavanaugh of Braddock barely ended on October 17 when her mother Anna, sister Lillian, and brothers Walter and Eugene were rushed to Braddock General Hospital to join Mary's brother Frank. They left at home two more flu victims, another brother, William, and his infant daughter Bernice. Elmer Fleck, thirty-one, already in Braddock General Hospital with influenza, became delirious with fever and jumped to his death from a second-story window.

On the nineteenth the flu hit new highs. One Pittsburgher caught the flu every ninety seconds and one died every fifteen minutes. Yet Pittsburgh was still better off than many Western Pennsylvania towns. In Rossiter, Indiana County, for example, one out of every five residents had the flu. Sharpsburg, Clairton, and Turtle Creek all sent frantic pleas for help to the state health department. Eventually, R. W. Gardiner, production manager for the fuel administration in Pittsburgh, called on the army to send doctors and nurses to the coal mining towns to keep up production of that resource.

Local corporations began making plans to inoculate their employees. Doctors frankly admitted that they did not know if the serum would help anyone, but they stated that it could do no harm and encouraged its use. The Bell Telephone Company began inoculations on the eighteenth, while the National Tube, H. C. Frick, Westinghouse,





Pittsburgh Coal, Union Trust, and Standard Steel Car companies followed suit. The Red Cross ordered for free distribution enough serum to inoculate 100,000 people.

The nineteenth saw 945 new cases, bringing the city total to 15,500. The next day, Sunday, the death rate hit 124. That day was a hectic one as the city's ambulance service almost ground to a halt. The steady stream of patients to the hospitals kept the ambulances in constant use and on that day six out of twelve broke down. A hasty scramble by the city produced two police cars and three ambulances from neighboring towns to take up the slack. Also on this day the city hospitals reached full capacity and began sending the overflow to Kingsley House. The stream of patients to the hospitals increased as the rising number of new cases made it impossible for the hard-pressed doctors to treat all of them adequately at home. One physician, who had cared for 209 cases in six days, received twenty-five new cases in a four-hour period. Fourteen of those he had to send to the hospital.

October 21 brought a dip in the number of deaths but the highest total of new cases. Every sixty-nine seconds another Pittsburgher caught the flu. Surgeon General Blue advised Edward Woods of the Red Cross to expect 100,000 to 200,000 cases of flu in Allegheny County. Normally the county would have 3,000 illnesses of all types. Mayor Babcock requested from City Council an appropriation of \$100,000 to fight the epidemic. Council took the motion under advisement, eventually appropriating \$50,000. City Council also got into a minor scrape when Councilman Enoch Rauh offered a resolution directing the health department to report on the number of absences in the schools in preparation of ordering their closing. When some members objected that closing the schools might alarm the public, Councilman William J. Burke dryly noted that "The public is already alarmed." 22 (At this time Burke did not know that his entire family would catch the disease or that his daughter Margaret had only fortythree more days to live.)

The day did bring some good news, however. The war department, noting the number of munitions factories in the area, agreed to send medical help. City mechanics repaired the broken-down ambulances and the Red Cross donated a supply truck to help transport patients.

The next day council received the report on absenteeism. A total of 27,357 children, or about one-third, were absent from school. Of this

number, 6,070 were known to have the flu, while fifty-three had died. Worried parents had obviously kept the rest home to avoid contagion. Health director Davis, who had kept the schools open to keep the students under medical supervision, ordered them to close.

The flu kept going strong. Deaths totalled 121 on the twentysecond and 133 on the twenty-third. Funerals were delayed because doctors did not have time to fill out death certificates. The city soon developed a shortage of both caskets and gravediggers. Thirty-three bodies lay unburied at St. Stanislaus Cemetery because of a shortage of gravediggers. Relatives of the dead eventually had to dig the graves. Elizabeth had 900 cases of influenza with all of their doctors "ill or exhausted." 23 In Pittsburgh a supreme epidemic council was formed on the recommendation of Dr. Royer:

to exercise control over all resources, whether of nurses, doctors, materials or money, that are made available in the county for fighting influenza. . . . Subject to this body will be all the township health officers and borough boards of health; Red Cross chapters working on influenza materials; committees of the council of national defense, physicians who are members of the auxiliary medical defense and volunteer medical service corps; local companies of the reserve militia; local troops of the Boy Scouts of America; associated charities, civic, religious, commercial, patriotic, social and fraternal organizations, and all other bodies desirous of lending aid to the agencies fighting the epidemic.24

The committee immediately began preparing a list of doctors and nurses who would be available to go where they were needed most.

Volunteer help continued to pour into the health department. Dr. George W. Shelton of the Second Church (Episcopalian) on October 21 offered his church as an emergency hospital and his church organizations to care for the sick of his parish. Four days later Bishop Regis Canevin of the Catholic Church did better than that. The Conference of Catholic Charities' eleven social workers had already been working among the poor during the epidemic. As the number of sick proved too much for them to handle, the bishop ordered all parish churches to set up nourishment and supply stations and to provide volunteers to take food, medicine, and clothing to the victims. On October 25, Bishop Canevin wrote to Davis:

In this great epidemic of influenza, when the department of health, confronted with one of the most serious emergencies in our city's history, and greatly handicapped by the lack of doctors and nurses to meet the overwhelming calls for help, is mustering every force in the community in the fight to control and stamp out the dread contagion, I feel it my duty to

²³ Ibid., Oct. 23, 1918.

²⁴ Ibid., Oct. 24, 1918.

place at the disposal of your bureau all resources of the Catholic Church in Pittsburgh.

At my direction the Conference of Catholic Charities has already established relief headquarters in every one of the 27 city wards at locations indicated on the enclosed list, where those afflicted with and suffering from the disease, irrespective of creed or color, may procure the needed aid.

Permission has also been granted and the reverend pastors urged to utilize any and all parish buildings and the teaching Sisters in every parochial convent stand ready to serve as visiting nurses.²⁵

Sacred Heart parish in Point Breeze formed the model for the others to follow. Lay volunteers from the convent headquarters surveyed every home in the parish. Where flu existed, nuns provided food and nursing services while the priests handled any spiritual needs.

The situation in the coal areas of Pennsylvania continued to worry health officials. As noted earlier, many small mining towns lacked any medical help. As the disease spread, coal production dropped 25 to 50 percent. In the Patterson mine alone, production fell from 1,100 tons to 200 tons a day. As coal fueled both industry and home furnaces, this situation could not be taken lightly. Setting aside their differences for the moment, the United Mine Workers and the mine owners formed a joint committee to get help from Washington. (The only wrangle that developed between these traditional enemies occurred when the committee decided to inoculate all miners and their families. The owners stated that they would pay for the serum, but the UMW district leader, Philip Murray, immediately objected, demanding that the union bear a part of the cost.)

The committee left for Washington on the twenty-second and soon found themselves in a bureaucratic maze. They stopped at the Red Cross first to get more nurses. They met with a Miss Noyes and if they expected a sympathetic reception, they were sorely disappointed. Miss Noyes informed them that Pennsylvania had only met 60 percent of its quota of nurses and tartly suggested that they return home and find the missing 40 percent. Still reeling from this, the committee visited the surgeon general, who claimed that he had offered help to Pennsylvania but had been turned down by Royer. He added that he ordered Dr. William Draper and more than thirty physicians from Massachusetts to Pennsylvania anyway and suggested that they go to Harrisburg and meet with Draper to have him assign some doctors to their area.

The coal men immediately travelled to Harrisburg. Since they did not know where to find Draper, they met with Royer, who bristled at the thought that Draper would have charge of the public health service doctors. The state health commissioner tersely told them that Draper and his men had not yet arrived but when they did he, Royer, would decide where they would be sent.

While the medical men fiddled, Pittsburgh continued to burn with fever. The United States checkers champion of 1912 and 1915, Hugh Henderson, forty-six, of Munhall died on the twenty-third. Fannie Greenwald of Marion Street fought for her life in Passavant Hospital not knowing that her twelve-year-old daughter Ester had died just a few beds away from her. Passavant Hospital was the scene of another family tragedy: "Influenza threatens to wipe out the family of William Walter of 49 Pride Street. Last Sunday Mrs. Walter died. Yesterday Walter died, and two daughters Evelyn and Sylvia Walter, 13 and 4 years old, respectively, are critically ill in the Passavant Hospital, where the deaths of their parents occurred. A third daughter, in the care of an uncle, is also ill." 26

At a stable at Thirty-first Street and Liberty Avenue, police found sixteen-year-old John Rezchnick of Jones Avenue lying in a wagon. He chose to fight the flu alone rather than go home and risk infecting his six brothers and sisters. By the time police had found him, he had spent four days there without food or water. Police also found Joseph Walker, twelve, of Chauncey Street at the corner of Penn Avenue and Seventeenth Street wandering in a daze from influenza.

By the last week of October, the situation in Pittsburgh looked grim. Mail deliveries slowed due to the number of postal employees who were sick.27 People on Eighth Street prayed that no fire hit their area for Engine Company Number Thirty-Three had only Captain Victor Nelson left to work the day shift. Carnegie Steel had 2,600 workers absent, a quarter of their work force. October 29 brought 176 deaths, the worst during the epidemic.

Despite these statistics, the mayor of Pittsburgh requested that Royer give the city the power to lift the restrictions imposed by the state health ban. Never fully convinced of the ban's merits, he claimed that 80 percent of the citizens of Pittsburgh opposed it. Should Royer refuse, Babcock demanded that he be given a chance to present his case in person in the state capitol.

Royer did refuse Babcock's request, stating that the movement to

²⁶ Pittsburgh Post, Oct. 20, 1918.

²⁷ Modern readers may be interested to know that the situation got so bad "in some cases" that illness among postal carriers "reduced deliveries of mail to one daily." Pittsburgh Sun, Oct. 29, 1918.

lift the ban was organized by the "liquor interests and the moving picture and theater interests, and . . . misguided clergymen." ²⁸ He added that although he would meet with the mayor, he had no intention of lifting the restrictions. After a two-hour meeting with Babcock, Royer did agree to send the state registrar of vital statistics, Dr. Wilmer R. Batt, to the city to study the situation at firsthand.

While the mayor and Royer engaged in their dispute, the fight against the epidemic continued. On the twenty-seventh the Allegheny County Medical Society's plan for having specialists help the overworked general practitioners finally went into effect. City Council appropriated the \$50,000 for fighting the flu the next day, and the public health service doctors began arriving.

Batt came to Pittsburgh on October 30. After reviewing the situation, he declared that the flu peak had already passed and that the ban might be lifted in the near future. Although Pittsburghers were dying at the rate of one every ten minutes, he pointed out that this reflected the length of time between the onset of the disease and death. The number of new cases reported had begun slowly but steadily to decline. Local health authorities relaxed the restrictions enough to allow brief meetings of lodges, building and loan associations, and the directors of organizations engaged in war work. Children went trick or treating as usual on Halloween, although the traditional downtown celebrations by the adults were cancelled because they included throwing confetti and everyone knew that confetti spread germs.

The disagreement between Royer and Babcock soon burst into open warfare. After meeting with Batt on November 1, Royer announced that he would lift the ban on Saturday, November 9, at noon. In the meantime, churches could reopen as of Wednesday the sixth. The news did not mollify Babcock. He denounced the November 9 date as arbitrary and stated that keeping the ban in effect would be useless. Although he lacked the authority to lift the ban, he announced that the city would no longer enforce it as of 5 o'clock A.M. Sunday, November 3. He carefully explained that he was not ordering amusement places to open, merely "authorizing and encouraging" ²⁹ them to do so. The city did move more positively to reopen the churches. Noting that the original order from Royer gave local authorities the discretion to close churches, Davis lifted the ban on them in time for services to be held on the third.

²⁸ Pittsburgh Post, Oct. 29, 1918.

²⁹ Ibid., Nov. 2, 1918.

Reaction to Babcock's order came swiftly. The theater owners and saloonkeepers reacted joyfully as apparently did most of the local citizens who had been missing Douglas Fairbanks in He Comes Up Smiling, Theda Bara in When a Woman Sins, and the Aeroplane Girls live on stage at the Academy burlesque theater. Most Pittsburgh newspapers also favored lifting the ban, though none with the fervor of the Leader, which denounced Royer and his "idiotic antics." 30

Royer responded equally fervently and quickly, though not so positively. Condemning the mayor's action as "an invitation to lawlessness and disorder," 31 he called on the citizens to obey the health department's ban. The next day he met with the state attorney general and representatives of the public health service to map out a plan of action. He renewed his call for people to obey his order and blamed the mayor's action on the liquor interests. He closed his statement with a rhetorical flourish: "With 163 funeral trains taking care of the dead in the city of Pittsburgh vesterday, it seems irrational and dangerous to think of lifting the restrictions at the present time. Human life must not be put in the balance against gold dollars." 32

Royer quickly found allies in the fight. The Protestant Church Council of Pittsburgh urged its member churches to remain closed. After meeting with Dr. Schaffle, Bishop Canevin agreed to cancel Sunday masses. The Allegheny County Medical Society also threw its support to Royer. By November 3 Royer soared to new oratorical heights. Painting a picture of the sacrifices made by those fighting the flu, he asked the citizens to prevent "hell turned loose" on those "now risking their lives and health at the bedsides of Pennsylvania's stricken sick." He then issued a thundering call to action: "A number of reckless wholesale and retail liquor dealers and some small business interests are putting dollars above human life. . . . Women of Pennsylvania, demand of your husbands that they forthwith shut the mouths of those who clamor for premature removal of these essential restrictions. . . . Men of Pennsylvania, be men; refrain from pulling political chestnuts out of the alcoholic flame." 33

Unfortunately, Royer's rhetoric failed to sway opponents of the ban. The president of the Retail Liquor Dealers Association calmly pointed out that Royer himself had admitted that the flu peak had passed. Babcock said that New York had the lowest death rate of any major city without imposing any bans.

³⁰ Ibid., Nov. 5, 1918.

³¹ Pittsburgh Post, Nov. 2, 1918.

³² Ibid., Nov. 3, 1918.

³³ Ibid., Nov. 4, 1918.

Having failed to persuade anyone, Royer turned to force. On November 3, he sent his chief legal advisor, Charles W. Webbert, with a group of investigators to prosecute those who defied the ban. Investigators from the Anti-Saloon League swelled his force to see that all saloons remained closed.

Battle began on the fourth. Most of the theaters and movie houses opened as scheduled. John P. Harris, general manager of the Harry Davis Enterprises, defended the move by saying that their "patriotism and civic duty" required the theaters to open in response to the mayor's orders, to provide the people with relief from "depression, dejection, and foreboding." ³⁴ Relatively few saloons — which faced the threat of license revocation — opened. Those that did "made a small mint." ³⁵

The defiance did not last long. Most of the saloons that opened in the morning closed as soon as they heard that the investigators had arrived. On Tuesday the fifth, the state filed charges against twenty-five theaters and motion picture houses, one dancing academy, and two downtown cafes. The owners were hauled in front of alderman George S. Wilson and released on \$500 bond. This brought the result Royer desired. All theaters agreed to close after the last performance of the day and some went so far as to telegraph news of their surrender to Harrisburg. This did not stop the state from filing charges against thirty more movie houses, five theaters, three saloons, two dance halls, and five poolrooms the next day.

Royer reacted to his triumph by repeating that he would lift the ban on the twelfth so long as the death rate dropped below 100 a day. He also added the welcome news that for the first time since the epidemic had begun, there were enough doctors and nurses available in the state.

The city was obviously passing from the epidemic's shadow. Except for brief flurries, the number of new cases dropped steadily. On November 1 doctors reported 585 new cases of flu. By November 8 new cases reported had decreased to 189. On November 6 the daily death rate dropped below 100 for the first time in more than two weeks.

Unfortunately, this improvement came too late for too many people. The statistics provided scant comfort to two-year-old Phyllis Graham of Elizabeth, who lost both parents in one day. Nor did it lessen the impact on Mrs. Margaret Conlon of Lehigh Avenue — already under

³⁴ Ibid., Nov. 5, 1918.

³⁵ Ibid.

strain from worrying about her two sons in the army and just recovering from influenza herself — when she heard that three of the four children she had thought safe, Sister John Francis, a Catholic nun, seventeen-year-old Francis and twenty-seven-year-old Marie, had all died of the flu. The news of their deaths drove her to a nervous breakdown. The disease cheated the executioner by taking the life of convicted murderer Nick Machovich in death row. Influenza treated Walter Sanowski of Oakdale more kindly, however. He was in court on charges of failing to pay the costs of a legal action "when it developed, all of a sudden, that he had Spanish influenza. . . . After everyone had scurried out of reach, the court gave Sanowski his liberty." 36

By November 8 the city had begun making plans to get back to normal. The health department had already decided that the schools would begin reopening on November 18. Royer confirmed that the ban would be lifted on schedule. The only restriction that would remain in place was the requirement that all amusement places be cleaned at least once a day, kept well ventilated, and that any customer who sneezed, coughed, or spit on the floor be asked to leave. By the weekend the University of Pittsburgh medical school began recalling those students assigned to the emergency hospitals. The ninth brought a sharp increase in new cases reported but city officials dismissed this as being due to doctors catching up on their reports. Certainly the news did not dampen the spirits of the citizens whose joyful celebration of the reopening of the saloons led to 161 arrests for drunkenness.

As the month progressed, the flu continued to loosen its grip on the area. On November 15, emergency hospitals in Tarentum, Natrona, Washington, Etna-Sharpsburg, and two in McKees Rocks closed. Three days later, the remaining two emergency hospitals in McKees Rocks, plus those in Port Vue, Willock, Rankin, Braddock, Carrick, and Turtle Creek shut their doors. On the same day the first group of children began reporting to school and the ban on public funerals was lifted. By November 25 Kingsley House had discharged its last patient.

Like a dving fire, however, flames of influenza briefly flared up during the month. Four times during the week of November 16 to November 23, the new cases of flu reported jumped to over 200 a day. Authorities attributed this to the weather and to crowding during the armistice celebrations. The disease continued to ravage the northern and western suburbs during the month. On November 21 Sewickley closed its schools, while Avalon, Ben Avon, and Bellevue closed theirs again three days later. People in the city of Pittsburgh continued to die of the disease. Conrad Dollhopf, seventy, of the North Side, his wife Laura, and his son Ewalt all died in late November. Influenza wiped out the family of James Hardman Davis of Oak Station — he, his wife Myrtle, and four-year-old Margaret. Dr. Marks warned Pittsburghers that the flu would not disappear until the spring and that they could expect 100 new cases and twenty to thirty deaths a day until then.

The epidemic had obviously ended, however. All that remained was to tally up the human costs of the Spanish influenza. Pittsburgh had paid a high price: more than twenty-two thousand reported cases and possibly that many more unreported; more than forty-five hundred dead and an estimated seven hundred children left orphans. Allegheny County had a total of more than sixty thousand flu cases. Yet Pittsburgh got away cheaply. Philadelphia suffered 150,000 reported cases. More than forty thousand Pennsylvanians died and an estimated fifty thousand children left homeless in the state, five thousand in Schuylkill County alone. Nationwide, the surgeon general estimated that five hundred thousand Americans died of the flu; this compares with 115,000 Americans who died during the war. Among that 115,000 were 20,000 flu victims. The government paid an estimated \$170,000,000 in death benefits to flu victims. Metropolitan Life Insurance Company paid more than \$18,000,000 in death benefits.

As the disease disappeared, it left behind a number of unanswered questions. What exactly had caused the flu? Neither during the epidemic nor afterwards did scientists pin down the specific virus. Where did it come from and how did it start? Why was the Spanish influenza so much more lethal than other strains of the virus? Why was Philadelphia hit so much harder than Pittsburgh? Where did the disease go? Perhaps the most important question of all is — will it ever come back?