

Disaster Study Number 10
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**THE EFFECTS OF A THREATENING RUMOR
ON A DISASTER-STRICKEN COMMUNITY**

by

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INTRODUCTION

On August 19, 1955, a considerable portion of the city of Port Jervis, New York, was overwhelmed by floods. The water had barely receded from the streets when, in the middle of the night, a false report began to circulate to the effect that a tremendous dam above the city had broken under the weight of the flood waters. About a quarter of the city's inhabitants fled within an hour.

The following week a team of psychologists began an investigation of the incident. This report will present the findings from that investigation.

Three main considerations motivated the research project: (1) Disaster situations seem to provide an opportunity for the study of human interaction under conditions of stress. (2) The apparent similarity of natural catastrophes to those of wartime leads one to believe that predictive statements about population behaviors under natural disaster might hold for war disaster. (3) An examination of the pervasive and threatening rumor which stimulated the exodus from Port Jervis might reveal the structure of this kind of communication network.

It is clearly difficult, if not impossible, to reproduce the emotional components of disaster situations in laboratory experiments with human subjects. At the same time, there is evidence that simulated disaster situations, such as mock evacuations, do not produce essential aspects of catastrophes. For example, in Spokane, Washington (1) during a mock evacuation, the observed pace of residents re-entering the city after the exercise was greater than their pace leaving the city. If research is to be done on disaster, it is necessary to conduct field studies of actual catastrophes in such a fashion that they provide comparable data, even though there is serious question about the kinds of hypotheses which can be tested under these relatively uncontrolled conditions.

Descriptive field studies in stricken communities indicate the kinds of problem which later can be examined more systematically. However, much of the data which have come out of these studies are not comparable in any meaningful way. While disjoint hypotheses can be offered from each, there is no way of deciding whether or not they

apply to any other situation. The sampling techniques and the kinds of information which are collected vary markedly from study to study. In some instances, the reproducibility of data extracted from interviews is questionable. The suddenness with which disaster strikes, and the consequent need to carry out the field study quickly, create tremendous difficulties in planning a coherent piece of research.

In the absence of any unified theory from which an organized set of hypotheses might be drawn, the Port Jervis incident was examined largely in descriptive terms. A large body of data was gathered with the use of careful sampling, interviewing, and coding techniques in the hope that it would be amenable to comparison to future studies, similarly conducted, and that it would begin to suggest hypotheses which could be tested and retested in other catastrophic situations.

Two kinds of data were collected. First, a series of interviews were conducted among officials in and around Port Jervis. A descriptive account of the rumor communication network and of behaviors of residents prior to and during the spread of the rumor was prepared from these data. Second, data were collected from a random sample of city residents, and (separately) from a saturation sample taken in the previously flooded section of the city. These data were analyzed to test some general hypotheses which were formulated before the field study was begun.

When we have once stated the unique characteristics of the disaster, we can begin to look into the kinds of stimuli which will affect the behaviors of the people involved. Even the limited comparisons which are available from previous field studies suggest that the effectiveness of measures taken to control activities in a disaster differs from situation to situation. Since an implicit applied problem in disaster research is the control of community behavior, it is of primary importance to be able to define the situation so that activities may be predicted and the proper measures for control can be instituted.

If the disaster studied is a "false alarm" or a rumor, as it was in Port Jervis, the question of the meaning of the data becomes even more complex. On an intuitive basis, one might say that while the false report is believed, reactions to it will not differ from reactions to a threat which turns out to be real. However, serious doubts are raised immediately as to whether post hoc reports given by

respondents about their activities during the spread of a rumor will be valid to the same degree as their reports of an actual disaster. Specifically, at least two possibilities exist. (1) After a false report, the respondent may desire not to appear "taken in" and may color his description of the events accordingly, or (2) the respondent may be able to give a more realistic picture of the false report, because his fears are unrealized and he suffers less shock.

If the respondent is either more or less accurate in his report of a false disaster than in his report of an actual disaster, it will be relatively fruitless to try to compare interview data from the two kinds of situation. In the Port Jervis study, a careful estimate is made of the empirical validity of data obtained from the interviews; it remains to be seen whether a match exists with data from actual disasters.

If the match is poor, of course, the study of rumors will have to remain relatively independent from the study of real disaster. If the match is good, we can examine certain reactions to false reports without differentiating them from reactions to other catastrophes, until the period of denial. Further, we may compare the communications systems of disasters which differ largely with respect to whether or not their referents are real or imagined.

In order to facilitate the development of comparable data, the methodology of the study is presented in greater detail than usual (see especially Appendices A, B and C).

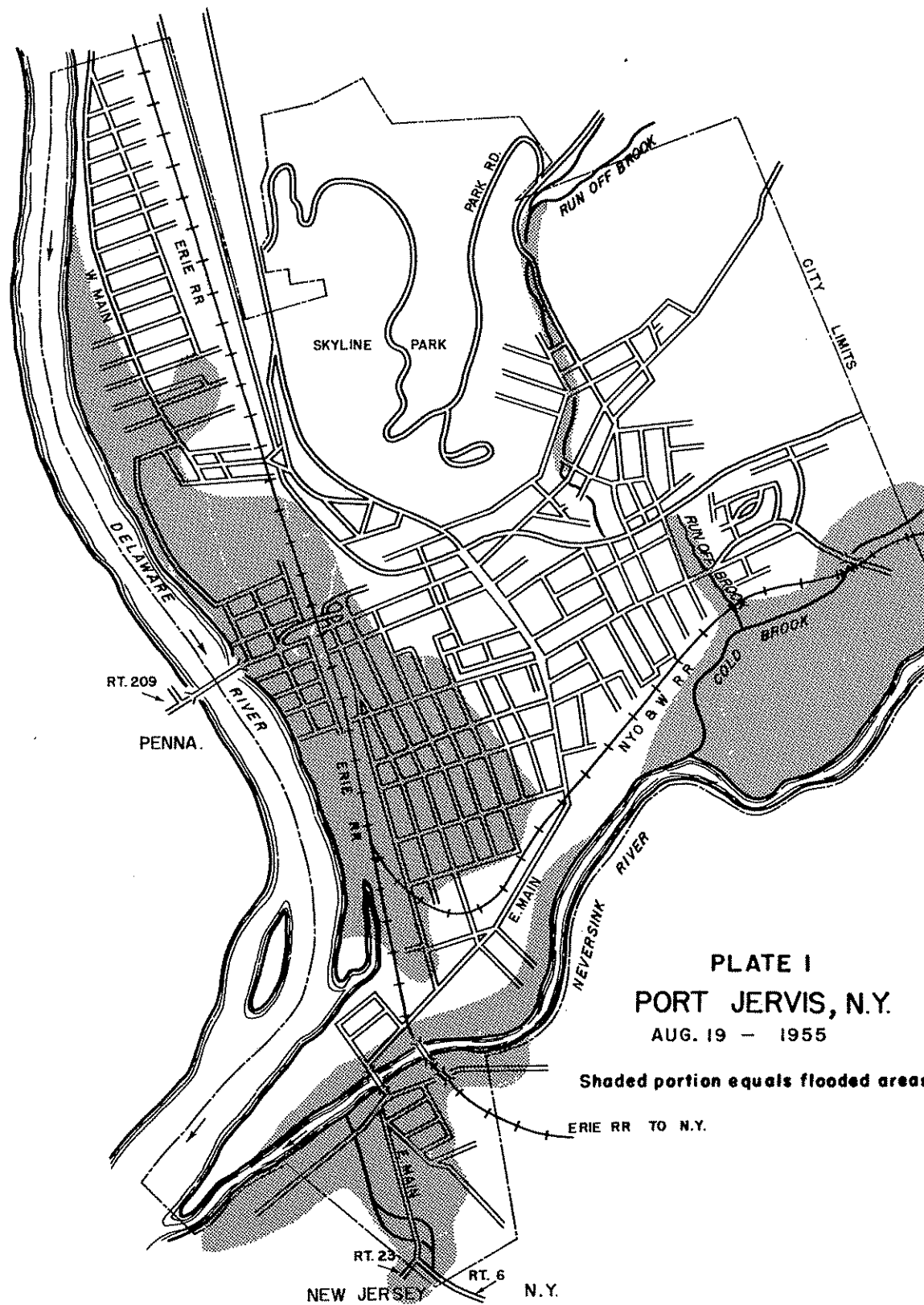


PLATE I
 PORT JERVIS, N.Y.
 AUG. 19 - 1955

Shaded portion equals flooded areas

ERIE RR TO N.Y.

I. HISTORICAL BACKGROUND

(Derived chiefly from interviews with the Editor, City Editor, and the Publisher of the Port Jervis Union Gazette.)

A. Population

Port Jervis has a population of approximately 9,000 persons. The population is predominantly lower-middle and middle socio-economic class. Most residents are white Protestants. There are three sizeable minority groups: Italian, Jewish, and Negro.

B. Industry

The major source of income for Port Jervis is the tourist trade. There are numerous summer resort camps in the vicinity. There are only a few manufacturing plants in the town: a silver plant, a textile mill, and a few smaller industries. A large number of employees of the Erie Railroad live here.

C. Geography

Port Jervis is located in the so-called Tri-State area, where the boundaries of Pennsylvania, New Jersey and New York intersect. Four dams are in the area. Wallenpaupack Dam is a tremendous dam located at Hawley, Pennsylvania, about thirty-five miles from Port Jervis. The water distance from the town as computed by Army engineers approximates 44-3/4 miles. There are reservoirs in the area and a brook in the northern portion of the town. The Delaware River runs along the southern boundary. The Neversink River runs along the eastern border and at one point separates a small section of the city from the rest. (See map of Port Jervis, N. Y. - page 4)

D. Previous Floods

From time to time the area has been flooded or threatened with flood. In 1901, a flood occurred which was characterized by inhabitants as serious. In 1903, the Delaware River overflowed, and there was water in the main street. In 1904 there was another inundation.

In 1922, the reservoir dam above the city appeared to be about to burst so that splashboards were pulled and certain areas of the town were washed out. In 1938, water deluged one section of the town. In 1942, a flood broke at nearby Sellerville and bodies which washed down from Hawley were picked up in Port Jervis. Almost annually there is some possibility of flood damage.

E. The Flood of August 19, 1955

On Wednesday night, August 17, and Thursday morning, August 18, Hurricane Diane hit the Tri-State area. There were heavy rains throughout the county, and the ground was saturated so that there was considerable run-off. There were showers during the day on Thursday, and by 10:30 p.m. the river was so high that the sirens were blown and the entire Fire Department was alerted and called out. At 2:05 a.m., Friday, the Mayor declared a state of emergency and turned the city over to Civil Defense. By 3:30 a.m. the underpass leading to an area known as "The Acre," which lies between the railroad and the Delaware River, was blocked off. This underpass is the only exit from the city to Matamoras. The river continued to rise from its normal crest of three feet until 6:00 a.m. when it reached a crest of twenty-three feet, eleven inches, which it held for one hour. There was further flooding in the area covering the railroad tracks. In many places the water rose to five or six feet, and there were four inches of water in the main street at one time.

In some cases people in the inundated regions were carried out of their homes by Fire Department volunteers. Others packed their belongings in cars and moved out as the water began to reach into their yards. The river began to recede after one hour, at the rate of six to eight inches per hour. When Governor Harriman visited the town late Saturday afternoon, he declared a state of emergency and called in the Mutual Aid Society. As a result, a large assortment of fire-trucks, pumpers and other vehicles began to move toward Port Jervis on Saturday evening to assist in the cleanup.

The Fire Department radio was on for ninety-six continuous hours with three operators. Total Fire Department personnel and equipment in operation in Port Jervis during the emergency period consisted of 1,000 firemen, thirty-four engine companies, a ladder company, two rescue vehicles, two ambulances and sixty-five portable

pumps. Seventy-three pieces of equipment and numerous cars came in under the Mutual Aid program from seven nearby counties. Two Army trucks and three helicopters also were in the area.

Port Jervis had an active Civil Defense organization and had sometime previously been named as an evacuation point for residents of New York City in the event of an air raid. Civil Defense was active during the flood and the clean-up. The Fire Department (which consisted solely of a Chief and two Assistant Chiefs on a part-time basis) and Police Department were augmented during this period by regular auxiliaries and volunteers, as well as by emergency volunteers.

1. The Union Gazette flood report: The Friday edition of the Union Gazette carried this lead story:

"August 19, 1955--Hurricane Diane splashed its turbulent waters on the Tri-States area during the past twenty-four hours and Mayor James E. Cole in the dark days of the early morning at 2:05 turned the City over to Civil Defense Authorities by declaring the City of Port Jervis in a state of emergency.

"Rushing waters inundated all the surrounding areas of the city causing mass evacuation of the entire First Ward beyond the railroad tracks, the Tri-States area in the Fourth Ward and all lowlands throughout the city.

"Streams which just a few short hours before had been barren, overflowed their banks, isolating Port Jervis from all local arteries leading into the city. All fire companies of the city were alerted early in the evening to perform the major portion of rescue work.

"Concrete bridges were ripped up on every highway causing huge amounts of damage, while Route 6 was smashed by three landslides toward the Lookout, while 6 was taking a terrific beating by swirling waters thundering off the mountain at Milford.

"Communications of the Tri-States Associated Telephone Company were severed into Pike County and also to the west

of Port Jervis and an estimation of the extent of the damage to the lines was impossible yet today. Erie Railroad lines were crippled with the washouts west of Port Jervis."

The Saturday, August 20, issue of the Union Gazette records that the Mayor had estimated damage of over a million dollars from the flood which had isolated the city on Friday:

"... The Delaware River reached a crest at 23 feet, 11 inches at 6 a. m. yesterday following 24 hours of rain in which more than 7 inches were recorded in the city. Heavy rains prevailed in all of the area surrounding Port Jervis... A river observer reported that after reaching the near-record level it held for about an hour before starting to recede. By 6 o'clock last night when he last checked the river gauge, the level had dropped to 17.8 feet. He stated that the reduction had been gradual, about 6 to 8 inches an hour... As the flood waters began to recede they left behind a mass of mud which covered streets, homes, furniture within the homes, and ruined gardens and lawns. The last of the waters were not gone yet this morning, but nevertheless, the cleanup started and continued unabated."

2. The official Fire Department report, made by the Fire Chief of Port Jervis, reads in part as follows:

"First call 8:30 p. m. Thursday, August 19, to pump out cellar, 28 Coleman St. Run-off brook overflowing. 9:45 p. m. Chief called. All companies alerted. 11:15 - ladders to evacuate number three zone. 11:55 - Evacuation. Seven-hundred people evacuated from the West End, River Side, 7 States and Fourth Ward on Friday."

3. The official Police report reads in part as follows:

"Emergency period 2:35 a. m. August 19 to 5 p. m. August 20. At 2:35 a. m., August 19, a state of emergency was declared. At this point entry to and exit from the city on Routes 6 and 206, 42, and 97 near Sparrowbush were blocked. Water covered the River Road."

"In addition to the regular Police, there were 20 auxiliary Police. The National Guard (40 in number) which had been available left at 7 a. m. on Saturday. At 8 p. m. on Saturday, 6 auxiliary Police patrolled on Riverside section till daylight. The regular Police were on duty in the Fourth Ward, and in the Tri-States there were 3-man details of auxiliaries on foot from 8 p. m. until daylight."

F. The False Report

There is good reason to believe that residents were sensitized to any reports concerning the river, floods, dam, epidemics, and so forth. On Friday and Saturday a number of rumors circulated to a limited extent concerning the Wallenpaupack Dam, the reservoirs above the city, and the possibility of a typhoid epidemic. Official checks were made with the Dam which may account for the fact that these rumors gained little, if any, momentum. Many people had been evacuated from their homes, and were only beginning to return to them. Hundreds were working around the clock pumping out cellars, removing debris, helping evacuees, and taking other actions designed to restore the city to normal condition.

The Associated Press wire carried a story at 2:30 a. m. Friday to the effect that at Hawley people saw water coming over the Dam, and that there was fear that the Dam had broken. This report was not published, but the word spread. At 6:30 a. m., the AP denied the story. The Publisher of the Union Gazette stated that this rumor had circulated before, but that no action had followed. There had also been a rumor that the drinking water carried typhoid fever. This story was stopped without great excitement.

The Monday, August 22, edition of the Union Gazette described the visit of Governor Harriman to the city, and also carried a description of a "false message" which caused an exodus on Saturday night:

"Added to the confusion of the flood and mess it left behind was the near panic which gripped the city on Saturday night and early Sunday morning when a false rumor, the source of which was unknown, spread like wildfire. The rumor had the Wallenpaupack Dam bursting, and throwing a massive volume

of water into the narrow valley above Lackawaxan, thence in the Delaware River, and on down upon already stricken Port Jervis.

"The rumor, which had spread like wildfire throughout the city, in both high and low sections, caused our citizens to begin fleeing the city. Before (the report) could be halted, most of the city was on the move. People dressed in only night clothing rushed from their homes and to their cars, some taking a suitcase of belongings along. Others fled with just the clothing they had on. The cars moved into Elks Bro Park and up Route 6 to get to the highest possible ground.

"The city Fire Department, with loudspeakers blaring, went about the city attempting to calm the populace and telling the the report was untrue and to return to their homes. Ralph Frederick of the Union Gazette staff, and a representative of Station WDLC, put that station on the air after midnight and repeated the story that the rumor was untrue for countless minutes on the air. Gradually the truth began to dawn on those who had fled. They returned to the city, but not until after they had created one of the greatest near disasters in history of the city. The actions of some could have resulted in a worse catastrophe than the flood itself.

"By morning, however, the scare had passed and people were back to normal."

II. COMMUNICATION PATTERN OF THE RUMOR AND DENIAL

The information which follows comes primarily from one to two hour interviews with thirty-one key individuals in and around Port Jervis. These individuals were chosen on the basis of their official positions, participation in disaster work, and their nearness (hypothesized or actual) to the central path of the Saturday night rumor. These persons are listed in Appendix B. In addition, approximately a dozen informal interviews were held with Port Jervis officials who were peripherally involved in the action, and with officials of nearby Matamoras whose activities affected the Port Jervis situation.

The story from these interviews is, on the whole, fairly consistent; there are some discrepancies which require inference on the part of the investigators. Where such discrepancies occur, they will be noted. We will attempt here to give a statement summarizing these interviews. In the detailed account which follows the summary, additional consideration is given to the action at various official centers.

A. Overall View

There is a good deal of concrete information which points to a general atmosphere of uneasiness on Thursday, Friday and Saturday. On Saturday night there were numerous rumors coming into Port Jervis from nearby towns, largely transmitted by telephone. Shortly before midnight, a false report came in which resulted in the exodus of a sizeable portion of the population.

The main source of this false report was a message from out-of-town transmitted over the radios on the fire-trucks which were pumping out cellars and homes in various parts of the city. The message was quickly picked up and passed on by one or more fire-trucks, individual firemen, and by neighbors and friends warning each other by word-of-mouth and by phone. Some people in cars rode through the streets shouting that everyone must get out.

Residents began to seek confirmation by going to City Hall, where the Fire and Police Headquarters are located. Others went to Civil Defense Headquarters, to fire houses, fire-trucks, and to

individual policemen and firemen. Others telephoned these and other centers, while some tuned their radios to the local station, WDLC. Many people, however, started making immediate preparations for flight to high ground.

Most of the official centers, Police, Fire, and Civil Defense took delaying action while they made contact by radio with the Wallenpaupack Dam or sources near the Dam. In other words, with the exception of the message from out of town which went to the various fire trucks, there was no spreading of the rumor by officials during the period of seeking verification. The principal message transmitted to residents during this period was that it might well be a false report, that they were checking with the Dam, and that residents should wait for official word.

A similar decision was made independently of other agencies at Fire, Police, and Civil Defense Headquarters; i. e., the decision to check with the Dam and to tell residents to wait for confirmation from this source. In addition to this independent decision, there were joint decisions made by these agencies when they began actively to communicate with one another. After the denial of the report came through, these agencies transmitted it to one another, to the local radio station and directly to the public in various ways. Two communications channels were used by officials for verification: telephone and short-wave radio.

B. Detailed Account

The reader will find it easier to follow the action if he refers to the schematic communication chart while reading this account.

Of the thirty-one key respondents, over half specifically mention that people were concerned with the river or Dam and describe rumors which circulated prior to the Saturday night episode. Three of these added that rumors concerning the Dam had circulated in previous years. There is some evidence that such rumors were in circulation concurrently with the particular report which gained momentum and swept through Port Jervis.

The manager of the local power company and the ticket agent at the Erie Railroad Station both reported numerous calls on Thursday

and Friday asking if the Wallenpaupack Dam had really broken. A official, a theatre manager, the Police Chief, a fire-radio operator the Mayor, a ham radio operator, and a member of the WDLC staff mentioned rumors about the Dam which they heard on Friday and Saturday. The statement that the Dam gates were going to be opened to relieve pressure was circulated, in part by the Police Chief. The message, which was designed to give reassuring information, may have been ambiguous and potentially threatening to inhabitants. A substantial portion of the resident sample reported hearing previous rumors. Many others reported widespread speculation as to what would happen if the Dam broke.

In addition to the rumors with a general flood referrent, the Police Chief and the ham radio operator reported a typhoid epidemic rumor which was squelched before it gained momentum when the City Health Officer gave counter-information on the radio.

The report which spread through Port Jervis on Saturday night appears to have originated in Sparrowbush, New York, a rural community a few miles west of Port Jervis. At about 10:30 Saturday night a stranger ran into a restaurant there and told the owner (who is also a volunteer fireman) that the Wallenpaupack Dam had broken. He added that firemen in a community up the river were evacuating everyone. The restaurant owner's telephone was out of commission because of the flood. He went with three other men to the highway and began stopping cars to warn them of the impending danger.

The second car stopped fortuitously was that of the Sparrowbush Fire Captain, who went to the fire house and radioed to the Fire Base Radio in Port Jervis. When he announced, "Emergency -- Stand by!", the air was cleared and all radios in the fire houses, fire headquarters, and on the fire-trucks, were held open for the message. He then reported that he had been stopped by firemen from Lumberland (one of whom was the restaurant owner) and was told that the Wallenpaupack Dam had gone out.

In Port Jervis, the Fire Chief was on a fire-truck in the flooded area pumping out a cellar when he heard this report. He notified the radio operator at Headquarters to ask for a repeat and for identification of the sender of the message. The Sparrowbush Fire Captain repeated the message and identified himself. The Port Jervis

Fire Chief immediately told his radio operator to check with the Dam through the Middletown Fire Base Radio Station.

During this period, the Port Jervis chief fire radio operator heard the report on a monitor set and rushed to headquarters to assist in the communication. When he arrived, he received a telephone call from a resident stating that one or more fire-trucks which had received the Sparrowbush message were driving through town, sounding their sirens, and shouting for people to get out because the Dam had broken. He decided independently to broadcast to the fire-trucks that he thought the report was false and that headquarters was checking on it. He also issued specific instructions to the errant fire-trucks mentioned above: "You have been given no orders to do what you are doing. Cut it the hell out and get back to the fire truck house." This was at about 11:15 p. m.

By this time, the rumor had gained considerable momentum. Cars were in the streets, and people were clamoring for everyone to get out of town. Residents were waking their neighbors, and groups of people were descending on City Hall, fire houses, Civil Defense Headquarters, and other centers in the city. In all probability, the rumor was also being carried into the city in cars and through telephone calls from outside.

In Matamoras, for example, a car-full of people came through the main street shouting for everyone to get out. Someone in the community heard this, ran to the fire house, and blew the fire siren before anyone there knew what he was doing. To at least some of the people in this town the siren meant impending flood, largely because officials had made an announcement to this effect during the flood to which they had just been exposed. A mass evacuation then took place in this town too. The Matamoras siren could be heard in the river-front section of Port Jervis; it may have had the effect of sensitizing residents to a threatening message.

The Police were at this time working either in cooperation with the Fire radio, or were making parallel efforts to check on the authenticity of the report through the Middletown Mutual Aid System. They got in touch with the Port Jervis Civil Defense Headquarters by telephone and asked them to check for verification at the Dam with the Civil Defense shortwave radio facilities.

The false report was first transmitted to Civil Defense Headquarters when Mrs. A., a Civil Defense official, called a friend on another matter. The friend said, "I can't talk to you because there is a sound truck outside telling us to evacuate because the Dam has broken. I'm packing to leave." Mrs. A. rang off and went to the short-wave radio in the next room.

There she met the chief radio operator and his assistant. The operators had just received a short-wave message from Police Headquarters asking them to verify the report that "The Wallenpaupack Dam has broken." They now looked at a map to find the closest place to the Dam. They decided that they should have two sources of information and should try to contact (1) the Dam superintendent and (2) the Scranton Electric Power Company. The radio operator first told his assistant to try to call Scranton Electric.

Before this time, he had been in contact with a ham radio operator in Port Jervis, who had established a relay channel through which he could radio Wallenpaupack Dam authorities. From Wednesday to Saturday the ham operator had periodically radioed the latest news on the condition of the Dam to Civil Defense Headquarters. For this reason the Civil Defense operator tried to radio the ham to ask him to use his channels to get through to the Dam. He was unable to reach him by radio, but finally got him on the telephone and asked him to do two things: (1) to try to radio the Dam for verification, and (2) to activate the emergency Army short-wave radio network. He cautioned the ham operator not to mention on the air that the Dam may have broken. He said, "Just ask for the condition of the Dam."

The ham operator then tried to radio the Dam, but was unable to establish contact through his regular channel. He radioed the Army and told them to activate the network, saying "We're not sure, but it may be a rumor." He then telephoned Civil Defense and told them to try to reach the Dam through their own channels, since he himself had been unsuccessful.

By this time, the Civil Defense office had been mobbed by people asking for verification, and asking what they should do if the Dam had really broken. As one person there put it, "It was as if a firecracker had been set off in the office..."

Mrs. A. asked people to wait for verification, and told them that the report was being checked at that moment. She felt considerable compunction about this, because she assumed that she was cutting down their time to escape provided the report was true. She looked at the map again, and estimated that there would be two hours time before the water reached Port Jervis. In light of this judgment, she continued to tell people to wait for verification, although she still experienced some anxiety about her own decision.

At this point, one radio operator received a telephone call from Police Headquarters saying that they had gotten through to the Dam and that the report definitely was false. The other radio operator had contacted Scranton Electric by radio, and a few minutes later he reported that Scranton Electric denied that there was anything wrong with the Dam.

Mrs. A. immediately transmitted this information to the waiting people. She informed them that she had two official sources of disconfirmation, and she relates that people were immediately calmed and left for their homes. At this same time, Civil Defense officials were in telephone contact with the local radio station, although it is not clear whether CD or WDLC initiated the communication. At any rate, WDLC had already received the denial from Police Headquarters when the communication took place, and was preparing to go on the air.

During all this time, the Director of Civil Defense for Port Jervis had been home asleep, after having worked day and night for CD during the flood emergency. He was awakened by his wife who heard frightened people yelling in the streets. He got dressed and drove down to Civil Defense Headquarters, but would seem to have arrived after most of the decisions at that center had been made.

Civil Defense, then, made the following decisions after receiving the threat message:

- (1) to seek verification from two official sources,
 - (2) to check the proximity of the threat to see if they could afford to ask people to wait for verification,
 - (3) to tell people to delay action while awaiting information,
- and
- (4) to disseminate the denial to as many people as they could contact.

The officials of WDLC, the local radio station, were also taking certain actions at this time. The station had gone off the air at its usual time, 11:00 p. m., and no one was on duty. The Program Director heard the rumor from a friend and went to WDLC. One announcer received a telephone call from a friend informing him of the Dam break. He went directly to Police Headquarters and conferred with the chief. Another announcer received the word from an official at Civil Defense Headquarters when he went there to report for flood relief duty. He then went to Police Headquarters where he met the other announcer. The announcers received the denial message from the Police Chief and carried this information with them to the Station Manager of WDLC. At 12:10 p. m., the Station Manager put the station back on the air to disseminate the denial message. We shall return this after seeing what was going on elsewhere in the city at this time.

When the false report first started circulating, many people called the local railroad station asking whether or not the report was true. Many of the callers were employees of the railroad. One of the people on duty helped to spread the rumor by stating that it was true as far as he knew. The other (at another phone in another part of the station) referred the calls to the Police. This employee called the Police himself (as soon as he could get a line through) and received the report that they "had no knowledge of the Dam having broken and that it was a rumor." The railroad man then conveyed this rather ambiguous message to all subsequent callers. Among organizations which had their own communications systems, this was the only one which was able to supply information as to whether people employed by such organizations will turn to them during emergency periods.⁽³⁾ The other organizations, such as the power company and the telephone company, did not have information bearing on this question. We do find, however, that in the case of the railroad, at least 20 per cent of those who called the ticket office to check on the rumor were railroad employees.

At approximately 11:30 - 11:40 p. m., the denial message came in from the Dam through various channels to Police, Fire, and Civil Defense Headquarters. The Fire Radio was apparently the first to receive the denial through the Middletown Base Station. The operators immediately informed the Fire Chief, who was still out in town on one of the trucks. The Fire Chief directed his radio operator to tell the people that the rumor was false, while he headed out of town.

stop a convoy of fire equipment which was coming into Port Jervis to assist in the cleanup. He had been informed of a tremendous jam of cars on the highways -- in some cases two-abreast on a two-lane highway -- and wanted to stop the convoy before it became hopelessly entangled. The radio operator went outside and, using the fire-truck loudspeaker, broadcast the denial message to the crowd in the street in front of Headquarters. Finding this quite effective, he returned to the short-wave radio, ordered all fire-trucks to turn up their loudspeakers, and used the truck radios as a public address system. He continued to broadcast this denial until 12:20 a. m., at which time the populace seemed to have calmed down fairly well.

At about the time the Police got the denial, the announcers from WDLC arrived at Police Headquarters. The Police Chief conveyed the denial to them and suggested that WDLC go back on the air. The announcers went back to the broadcasting station. In the meantime, the Chief personally spoke to the gathering crowd at City Hall and dispatched officers to stop people on foot and in cars who were spreading the rumor. The Police radio operator also called Civil Defense to inform them that they had received the denial, and that Civil Defense could discontinue attempts to verify.

WDLC went back on the air at 12:10 a. m. and began broadcasting the denial. The first message was: "Ladies and gentlemen: The rumor that has been going around that the Wallenpaupack Dam broke is not true; it is nothing but a rumor. We have been in contact with Dam officials." This message was alternated with record and organ music for about fifteen minutes. In the meantime, one of the announcers edited the message carefully to eliminate all references to the Dam, water or flood, fearing that someone might tune in on the message only long enough to hear the word "Dam" and then run. After one or two short messages: "It is only a rumor. It is NOT true," this message was developed: "Ladies and gentlemen. It is only a rumor -- it is NOT true. There is no need for anyone to be up on mountains or high places. It would be best if you returned home and did not spread the rumor." This message was repeated at intervals while the remaining time was filled by music.

Since many of the people in town were thought to know and trust certain of the announcers, the Station Manager and two announcers took turns reading the denial message. At 1:15 a. m., they also played

a four-minute one-way conversation with the Dam superintendent, who reported that the gates had been opened for a few minutes at 9:30 p.m. to relieve pressure, but that everything was in fine shape. In addition they broadcast an interview with a river official who gave out reassuring information. The denials continued to be broadcast until 2:43 a.m. when, in consultation with the Police, it was decided that the town had quieted down and little more needed to be done.

During the preceding period, officials at WDLC took other positive action in spreading the denial message. They contacted the local paper, asking them to request AP in New York to spread the denial. They also called CBS-TV and radio in New York, since these stations reach Port Jervis, and asked them to assist in the denial broadcast. Finally, they contacted Civil Defense and the Sparrowbus Fire Department requesting assistance in communicating the denial to those who did not have radios or did not have them tuned in. One peculiar thing stands out in all this. A few key respondents reported a broadcast in which they were asked to turn up the volume of the radio so that others might hear the message. Only one sample respondent reports such a broadcast, and no person at WDLC reports such a message going out over the air.

This, then, is a detailed sketch of the actions taken at various official centers during the rumor period. It is interesting to note that it did not occur to any of the officials interviewed at Police, Fire, or Civil Defense Headquarters to leave their posts and flee. None of the key interviewees reported full belief in the false report, which may account for the fact that they did not think of flight. However, some of them stated that "I was expected to stay here," or "I was up all night and was too tired..."

Summary

An examination of the information from official sources leads to the following general conclusions:

- (1) Independent decisions to verify the false report by contacting officials at or near the Dam were undertaken at the main communication centers; Fire, Police, and Civil Defense Headquarters.
- (2) None of the officials at the main communication centers disseminated the false report while waiting for verification.

(3) Officials at a semi-official center were called upon for verification by at least some of the employees there, and in some cases these individuals disseminated the false report while awaiting verification.

(4) No official at any of the main communication centers reported considering flight during the period of belief or the period of waiting for verification.

(5) After receipt of the denial message, all agencies actively attempted to disseminate the denial to the population through various media such as loudspeaker, radio, and face-to-face communication.

(6) The Fire and Police Departments and the local radio station were the primary agents in the public communication of the denial message.