**Sawtooth**: McPherson labs possible hazard in spite of good safety record

By Leslie Dykes

While its safety record is good, the laboratory area of McPherson Chemical Laboratory needs to be replaced due to conditions that pose a potential health and safety hazard, according to some officials.

The area is "a horror that should have been replaced years ago," said Leon M. Dorfman, chairman of the Department of Chemistry.

The laboratory area — commonly called the "Sawtooth," due to the jagged, tooth-like appearance of its roof — is used mainly for freshman chemistry laboratory classes.

The Sawtooth is a separate building, adjacent to McPherson Chemical Laboratory.

Dorfman specifically cited the chemical drainage system, consisting of open troughs located in the central hallways and labs of Sawtooth, as a hazard.

The smell from the drainage system "does, at the very least, cause discomfort," Dorfman said. He added that he "was not sure if the fumes were conducive to good health."

Problems in the building have been noticed since 1974, when an investigation authorized by the Ohio Board of Regents found the plumbing and electrical distribution systems failed to meet present code standards.

A study recently published by the regents on capital expenditures for the University found the lack of adequate air handling and cooling capacities in the Sawtooth area "presents problems for the building's present use as a chemical laboratory."

The report concluded that all building service systems were worn out and some wooden materials have become both high maintenance items and safety concerns.

Some officials feel the entire building should be replaced. The building is too old and outdated to be repaired, according to William J. Griffith, Director of Campus Planning and Space Utilization. "It's not adequate to handle the classes," he said.

Despite the potentially hazardous conditions, the Ohio Board of Regents, which plans and coordinates money funded by the state for all higher educational institutions, did not approve a $7 million proposal that would replace the Sawtooth with a new laboratory facility for the 1977-1979 budget period, Griffith said.

Jack Probascio, planning officer of the Board of Regents, said the board didn't have the funds to recommend the $7 million proposal to the Ohio legislature.

A $9 million proposal to replace Sawtooth has been drafted for the 1979-1981 time period, and "if everything goes according to plan, the earliest a building would be ready for use would be Autumn Quarter 1982," Griffith said.

Dorfman said the Department of Chemistry has tried for six years "to get the building replaced." It was built 55 years ago.

One section of the open drainage system is located one foot from corroded electric, water and gas lines, according to Dorfman and another University employee.

In one research lab, located on the north side of the building, the electrical outlet is inoperable due to rust, and pieces of plaster and cement have cracked from the walls and fallen into the sink. A student who worked in the lab said water from a research lab on the floor above often dripped from the ceiling.

Poor conditions forced the Department of Chemistry to close one lab at the beginning of Spring Quarter. Sinks were disconnected from wooden work benches, and corroded water pipes had warped and rotted the benches.

University employees found 14 of 20 metal stopcock valves, used to regulate gas in experiments, leaking in a freshman level lab, Dorfman said.

A graduate student who works in the lab said the chemical fumes used to ventilate hazardous fumes in the freshman level labs were a real tragedy and "poor excuses for fume hoods."

If a fire did occur in McPherson, the alarm system is only equipped to warn students in the building, and is not connected to the fire department, said Thomas B. Smith, associate vice president for the Office of Physical Facilities.

The $9 million proposal suggests Sawtooth, located on 18th Avenue, be torn down and a new facility be built on the same site, Griffith said.

If approved, the new building will be used largely for instructional purposes, contain some office space, a few research labs, and have a chemical storage area, Griffith said.

Probascio said the replacement of Sawtooth is one of the board's top priorities.

Exposed pipes can be found a foot away from drainage systems, rusted and corroded.
Prof looks for overcrowding if McPherson lab replaced

By Jill Hardesty
10-16-79

A plan to accommodate the 3,000 chemistry students to be displaced each quarter for the planned demolition of the Sawtooth chemistry building will create overcrowding and a major coordination problem, said one official in the chemistry department.

If the Ohio Senate passes the capital improvements bill, the Sawtooth portion of McPherson Laboratory is slated for destruction in Autumn 1980.

The project, which will take less than three academic years, leaves the chemistry department short of time and space, said A. L. Mathews, administrative manager of the department.

The Sawtooth building caters primarily to the freshman-sophomore chemistry program. Only 20 percent of the building's function is for graduate research. Renovation is underway in Johnston Laboratory and in the fourth story portion of McPherson to house the graduate research students.

The undergraduate program will be transferred to Rightmire Hall on West Campus, which is set up for 950 students, Mathews said.

To successfully accommodate this 'overflow' of students from Sawtooth, classes are scheduled 65 hours a week, with lab sections on Saturday and evenings.

The number of required lab hours will be cut from three to two hours a week, Mathews said. The loss of this hour in lab time will be made up in a recitation class.

"We need to make this sacrifice and operate in cramped quarters in order to get the Sawtooth replaced," he said. "It's going to be difficult to operate under these conditions."

Additional funds of $100,000 are needed in movable equipment to implement the plan, he said.

Storage space is another problem confronting the chemistry department. Due to the limited width of the hallways in Rightmire, storage lockers cannot be installed without violating the state fire code, Mathews said.

Supplies are to be stored in the tunnels connecting the buildings on West Campus. One small elevator in Rightmire will make it difficult to transport supplies to the classrooms, Mathews explained.

More than half a century old, the Sawtooth wing was not a good building even when new, according to Mathews. "It was inadequate as a facility in 1920 and poorly designed."

When Melvin Newman, emeritus professor of chemistry, came to OSU in the early 1930s, he was told that the Sawtooth was in such dilapidated condition that it was soon to be re-placed "and we're still using it," Mathews said.

The large expanse of roof over the Sawtooth wing is one of the major faults of design, Mathews said. "The exhaust fumes accumulate in the roof cavities and on a hot day you literally have smog in the building," he added.

The drainage system consists of an open trench running under the floor which is not only dangerous when flushing chemicals, but also contributes to the smog and odor in the building, Mathews said.

"The building leaks so badly," he continued, "that I've seen students wearing rubber boots in class to avoid getting their feet wet."

The new lab will house the newest in equipment and every student will work in a fume hood instead of an open bench. "This is the most important feature to be incorporated in the new building," Mathews said.

From an academic standpoint, despite the poor facilities, the job gets done although Mathews believes there is not the same attitude as in newer facilities.

"Recruiting graduates has been a real problem," he said. "The condition of the facilities has a lot to do with that."
Decaying 'Sawtooth' limits chemistry program

By Elizabeth A. Eberlein

McPherson 'Sawtooth' Chemical Laboratory was considered to be the worst building in Ohio's public higher education system in 1974, according to the Board of Regents' Co-ordinating Board for Higher Education.

According to Jack Probasco, facilities planner for Campus Planning and Space Utilization, that situation has not changed. Unless funding is provided for the replacement of 'Sawtooth,' the problem will continue, he said.

"Today I still think it is the worst building in the public higher education system and the No. 1 project in the state that should be funded," he said.

"Sawtooth" was constructed as a temporary building in 1922-1925.

"In the '60s the department tried to replace it, and it has been an on-going problem since," said Andrew Wojcicki, acting chairman for the department of chemistry.

"The condition of 'Sawtooth' has deteriorated to the point that renovation is almost impossible," Wojcicki said.

William J. Griffith, associate vice president for Campus Planning and Space Utilization, said, "It needs to be replaced because it is a poor teaching tool and puts limits on what can be taught in that building.

"The university has asked the Legislature for money to replace that building for the last 10 years," Griffith added.

"The university has asked the Legislature for money to replace that building for the last 10 years."

—William J. Griffith

OSU officials are hoping the state legislature will act promptly in passing the 1981-82 capital improvements bill. The bill was passed by the Ohio House June 3 and is being held in the Senate Finance Committee until a permanent State budget is approved.

If passed, the bill would provide $1.49 million for the planning of a new McPherson "Sawtooth" Chemical Laboratory. Part of the money would be used to renovate Johnston Laboratory in preparation for the transfer of research labs from "Sawtooth" into Johnston.

It would allocate a total of $12.89 million for utilities and renovation projects at Ohio State. A portion of the money would be used for the installation of a new air conditioning and ventilation system in Evans Laboratory.

"We desperately need 'Sawtooth' replaced in order to ensure the quality of our educational program," Wojcicki said.

He said problems that have affected the chemistry department's research and instruction programs include: Lack of ventilation; heating/cooling system and air circulation difficulties; rapid deterioration of walls and ceilings; inadequate plumbing; leaky faucets and flood problems which are a "common occurrence;" a poor chemical drainage system; exposed electrical wires; and substandard lighting levels.

"Certain kinds of experiments can't be done because they would present safety hazards dangerous to occupants of that building," he said.

Wojcicki said corrosive and reactive chemicals cannot be used because of the inadequate drainage and ventilation systems. Students are not permitted to use chemicals which have low boiling points and produce vapors, such as ether and benzene.

"We desperately need 'Sawtooth' replaced in order to ensure the quality of our educational program."

—Andrew Wojcicki

These problems have hurt the department's research and teaching programs for chemistry graduate and undergraduate students. Because of the limitations, students are not being exposed to the type of experiments which would be desirable for college level education, he said.

"Proper facilities are necessary to conduct this research and are also vital to our teaching programs," he said. "We have had to ask ourselves 'What experiments are safe to do in this building?' instead of 'What experiments would be most educational?'."

In addition, Wojcicki said, "One of the adverse effects of 'Sawtooth' is that we have not been able to recruit many good students to a chemistry major.

"A lack of good students produces low quality research, which in turn gives the department a bad reputation nationally and within the university," he said. "The best faculty won't want to associate with the department, and instruction and research go hand in hand."

Wojcicki also expressed concern over the long-term effects of poor teaching facilities.

"We would like to be one of the departments which would provide the chemical industry with a well-trained and educated student," he said.

"This is the largest university in the state and the largest research oriented university at the same time," Wojcicki said. "I think it should be important to the entire university community and the entire state to settle this question."
Old Sawtooth dying and no one grieves

27 November 1981
By Gary Kiefer
Dispatch OSU Reporter

There will be no eulogy at the funeral of Old Sawtooth.

The reason, quite simply, is that nobody can think of a nice thing to say.

Old Sawtooth is the nickname attached long ago to the irregularly shaped wing of Ohio State University's McPherson Laboratory, 140 W. 18th Ave., which houses student chemistry laboratories.

The lab area, built in 1921, has been considered obsolete and inadequate for the last 15 years.

It most closely resembles a huge warehouse with long wooden tables stretching between exposed pipes and floor drains under open metal ceiling beams. Even when filled with today's students, it looks like a scene out of a college yearbook from the Great Depression era.

MOST STUDENTS dread having classes in Old Sawtooth. Faculty members find it professionally embarrassing. And administrators sheepishly admit that most high schools offer better laboratory facilities.

Since 1966, OSU has tried unsuccessfully to get funds from the Ohio General Assembly to replace the wing. That's why there was quite a bit of rejoicing on campus this week when Gov. James A. Rhodes signed a capital improvements bill that provides $16.4 million to construct a new laboratory.

"Replacing Old Sawtooth is absolutely our No. 1 priority among capital improvements," said Richard Jackson, OSU's vice president for business and administration.

"Everyone around here thinks that facility is a disgrace for a modern university."

Jackson said OSU "will go to the (state) Controlling Board as soon as possible to ask for release of the funds to begin architectural engineering studies."

OSU OFFICIALS estimate it will take at least three to four years to complete the project, which will involve demolishing the Old Sawtooth wing and constructing a new lab on the same site. That means the project could be completed 20 years after it was first requested.

Still, administrators and faculty members are celebrating because the capital improvements bill represents the first step in the right direction.

A report on OSU physical facilities compiled last year points out some of the shortcomings of Old Sawtooth, which was described as being "deteriorated to the point where renovation is untenable."

The report said "undesirable vapors often permeate the instructional laboratories because the existing chemical drainage system consists of open surface troughs with inadequate drainage."

"All components of the utility service systems are inadequate," it added, mentioning plumbing and electrical systems which fail to meet code requirements, an "obsolete" heating system and "sub-standard" lighting levels.

THE INITIAL capital improvements bill passed by the House of Representatives had included only about $1.5 million for planning the laboratory project.

But because OSU officials feared there would not be another capital improvements bill in the next year, they pressed Senate members to include full funding for the project.

William Napier, director of governmental relations for OSU, gave credit for the additional money to Sen. Ted Gray, R-Columbus, who sponsored the amendment calling for full funding, and Sen. Michael Schwarzwaler, D-Columbus, who mustered support for the amendment among Senate Democrats.
Kellam & Associates Inc. of Dublin was recommended by OSU to design a $16.4 million building to replace a deteriorated Sawtooth — the chemistry facility attached to McPherson Chemical Laboratory.

The $16.4 million is part of a $90.4 million OSU capital improvements allocation approved by the Ohio General Assembly in November.

The OSU Office of Physical Facilities chose the architectural firm after interviewing potential firms submitted by the Division of Public Works Commission, said Thomas B. Smith, associate vice-president for physical facilities.

In choosing Kellam, University Architect John H. Seilhamer said many criteria were considered, including the history and size of the firm, the ability to coordinate the work with the university, and the firm's minority recruitment.

Kellam designed Pressey, Bevis and Scott halls — all of which are on West Campus — the Scioto Downs racetrack and the Sheraton Center.

Jeff Diffenderfer, vice-president and director of marketing for Kellam, said the Division of Public Works and his firm will begin negotiations soon.

"The biggest challenge to us is to design a chemical educational facility for the 21st century," Diffenderfer said.

State Architect George Hodge said he is not sure when the contract will be finalized, but that it should go through without any problems.

Seilhamer is hoping the contract will be finalized by the end of January. He also said that although Kellam has not been officially hired, the firm is already studying the project.

William J. Griffith, director for the Office of Campus Planning and Space Utilization, has estimated that it will take 15 months for the firm to design Sawtooth's replacement.

The contract document includes everything about the building, "right down to the last screw," he said.

Smith estimated that Kellam will probably end up with 150 30-by-42-inch drawings. He also said a specification book provides more detailed information about the building which is not specified on the drawings.

After the contract documents are finalized, the contract bidding starts to determine which construction firm will build the structure.

Smith said after the contract documents are finalized, it will take approximately two years to construct the building.

Seilhamer said the most challenging design problems will be to integrate the new building with the existing chemistry buildings, to design it so there is a smooth flow for pedestrians and the physically-impaired, and to make it energy-efficient.

"We will take advantage of the latest in design theories and equipment," Seilhamer said.

He said the present building is strictly utilitarian and not very aesthetic. A taller, better-landscaped building would re-enhance the environment, he said.

Those involved in the project said renovating, instead of rebuilding Sawtooth, would have been economically and structurally impractical.

"It has deteriorated beyond renovation," said Andrew Wojcicki, acting chairman for the chemistry department.

He said the building has deteriorated walls, inadequate ventilation, and poor plumbing and drainage systems. He said these are just a few of the problems.

Wojcicki said certain chemicals cannot be used because of the poor facilities, and these factors have hurt educational experiments and research projects.

Those involved in the project expect the building to be at least three stories high.
'Sawtooth' to bite dust

New chemistry facility slated for autumn 1985

By Nancy E. Ford
Lantern Staff Writer

The OSU Board of Trustees recently approved plans for the construction of a chemistry facility to replace the 60-year-old portion of McPherson Chemical Laboratory known as the "Sawtooth."

The new four-story building, to be located between McPherson and Evans Laboratories on 18th Avenue, will house general and organic chemistry laboratories, offices, classrooms and supportive services areas.

The cost of the new facility will be approximately $13.6 million, funded by an appropriation of $16.4 million from the Ohio General Assembly.

Construction is expected to be completed by autumn 1985.

According to A.L. Mathews, administrative manager of chemistry at OSU, the "Sawtooth" does not meet building codes. It was therefore more economically feasible to replace, rather than bring it up to standard.

The "Sawtooth," named for the jagged shape of its roof, was hastily built as a temporary structure in 1921, Mathews said, but remained in use until winter 1983.

The architecture firm of Kellam Bird Johnson Inc. has been chosen to design the replacement structure because of its experience in designing industrial and educational laboratories.

Gerry Bird, vice president and director of architecture at the firm, said construction documents have been completed and submitted to the university for approval.

The four-story building will allow a peak occupancy of 750 students, teachers and support personnel. It will be connected to the adjacent Evans and McPherson Labs by enclosed walkways at the first and second levels.

Bird said his firm will oversee construction to guarantee it meets all specifications and budgets, and to watch its progress.

Since the cost of the new equipment and the "Sawtooth"s" demolition was lower than anticipated, Bird said, additional funds will be used to buy more chemistry supplies.

Until construction is complete, classes have been moved to McPherson, Evans and Johnston Labs and Rightmire Hall.

Renovations in Johnston Lab and the time-consuming removal of asbestos from the "Sawtooth" will delay its evacuation and demolition until late August.

Mathews added, however, that all work was contracted to be done at night to prevent further disruption of student activity.

The "Sawtooth" would have been completely destroyed if not for a 100-foot portion of its wall which it shares with Evans Lab.

Although the wall posed design problems for the new facility's architects, Mathews concluded with a smile, "a short section of the 'Sawtooth' will forever be with us."
A model of the new building which will replace the "Sawtooth" portion of McPherson Chemical Laboratory after it is demolished later this summer. The new building will house teaching and research facilities for general and organic chemistry, along with offices and classrooms.
NEWS ADVISORY

Gov. Richard F. Celeste will join Ohio State University President Edward H. Jennings and other university officials for a groundbreaking ceremony for a new $16.4 million chemistry building on Monday (5/14) at 11 a.m.

The ceremony will take place at the construction site on West 18th Avenue, just west of Evans Laboratory (88 W. 18th Ave.), and will conclude with the governor using a front-end loader to help move earth for the project.

Gov. Celeste will make brief comments, as will President Jennings, Provost Diether H. Haenicke and Sheila Schuette, a doctoral candidate in analytical chemistry. The master of ceremonies will be Heinz Floss, chairman of the department of chemistry.

The new four-story chemistry building will include 12 general chemistry teaching laboratories, six organic chemistry laboratories, classrooms, offices and support areas. The building will be connected to existing chemistry facilities in McPherson and Evans Laboratories.

Construction is expected to be completed in early 1986.

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(Contact: Leon Rubin, (614) 422-2711.)
Chemistry building construction begins

This architectural model depicts the new chemistry building that is being built where the McPherson Sawtooth lab used to be. Construction will be finished by January '85. Classes in the four-story building will begin that summer.

By Pamela S. Ross
Lantern staff writer

Construction of OSU's new chemistry building is finally underway.


The new chemistry facility, to be located on West 18th Avenue where the McPherson Sawtooth lab was, is expected to be completed in January 1986.

Al Mathews, administrative manager of Chemistry, said, "The first classes will not be scheduled there until summer of '86."

The chemical laboratory facility is being funded by appropriations from the Ohio legislature.

The building, designed by Kellam & Johnson, Inc. of Columbus will have four floors and a basement.

The first floor will house administration offices, classrooms, a learning resource center, laboratory stores and room for chemical storage.

On the second and third floors, there will be 12 general chemistry laboratories. Six organic chemistry labs will be on the fourth floor.

The facility will also have laser and spectrometer labs in the basement.

Mathews said the building will provide more room for these labs and will be a great improvement over what exists now and what Sawtooth provided.

The individual labs are designed for 20 to 24 students. The building is expected to be used by 4,300 students and 150 instructors in an average day.

Mathews said the building will accommodate just slightly more students than Sawtooth did.

"The new building will allow us to offer more day labs," Mathews said. "Some night labs will be available, but we don't have to insist students take night labs."

Mathews said that because of lack of lab space now, labs are being scheduled as late as 9:30 p.m.

Fire codes require that the building be separated from adjacent buildings, so the new building will only be connected to Evans and McPherson labs on the first and second levels by enclosed walkways.

Entrances for the handicapped will also be provided.
FACT SHEET -- NEW CHEMISTRY BUILDING

5/14/84

Location: On West 18th Avenue between McPherson Laboratory and Evans Laboratory on site of old McPherson addition.

Construction: Started -- April 24, 1984
Estimated completion -- Jan. 17, 1986
Architectural firm -- Kellam & Johnson, Inc., Columbus
General contractor -- Massaro Corp., Pittsburgh, Pa.
Heating, ventilating, air conditioning -- Sauer Mechanical, Inc., Columbus
Plumbing -- Julian Speer Co., Columbus
Fire protection -- Grunau Fire Protection Co., Cincinnati

Facilities: Twelve general chemistry teaching laboratories on second and third levels and six organic laboratories on fourth level. First level will contain laboratory stores, chemical storage, administration offices and conference rooms, classrooms and a learning resource center. Basement contains laser, spectrometer laboratories.

Basic design: Founded on drilled caissons to bedrock. Steel frame structure with pre-cast concrete floor deck. Exterior facebrick to harmonize with surrounding architecture. Heating and ventilation from centralized zone air handlers supplied by hot and chilled water from university power plant. Site to be landscaped and paved.

Design features: Four-story building with basement; proper fire code separation from adjacent buildings, although connected to Evans and McPherson laboratories by enclosed, covered walkways at first and second levels. Handicap access is provided for building users. Natural daylighting and ventilation provided to all laboratory spaces.

Cost: $16.4 million appropriation from Ohio legislature.

Expected accommodation: Each instructional laboratory will accommodate 20 to 24 students under supervision of instructors. Peak occupancy -- 750 students, teachers and support personnel. Normal daily use by 4,300 students and 150 instructors.
COLUMBUS, Ohio -- Ohio State University's new chemistry building "will allow us to provide our students an educational environment which will be second to none," the chairperson of the department of chemistry said during groundbreaking ceremonies Monday (5/14).

Heinz G. Floss, professor and chairperson of chemistry, said Ohio State "has long prided itself in maintaining one of the premier chemistry departments in the country. Our challenge is to preserve this excellence and to further improve on it. The building for which we are breaking ground today will greatly help us meet this challenge," Floss said.

The $16.4 million project, funded by state capital appropriations, is scheduled for completion in early 1986. It will include general chemistry teaching laboratories, organic, laser and spectrometer laboratories, classrooms, offices and support facilities. The structure will be located on West 18th Avenue, between McPherson and Evans laboratories.

Remarks were made during Monday's ceremonies by Gov. Richard F. Celeste, Ohio State President Edward H. Jennings, Ohio State Associate Provost Elmer F. Baumer and Sheila Schuette, a doctoral candidate in analytical chemistry.
While a student, he was awarded two National Science Foundation graduate fellowships, a Woodrow Wilson Fellowship and a Marshall Fellowship.

He has held visiting faculty positions at Princeton University and Stanford University while a Bell Laboratories staff member. He is a member of the editorial advisory board of the Journal of Molecular Spectroscopy, chairman-elect of the Gordon Research Conference on Plasma Chemistry and vice chairman of the Molecular Spectroscopy Section of the Optical Society of America.

Preliminary contacts with potential eminent scholars were a part of the process of developing proposals that were submitted to the Board of Regents for consideration.

Colleagues of Miller who were asked to comment on his credentials for the eminent scholar position gave him glowing recommendations. He was called "one of the outstanding physical chemists of his age group" by one colleague. Another said he is "an internationally recognized authority in his field."

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(Contact: Leon Rubin, (614) 422-2711.)
Governor joins in groundbreaking

By Leon Rubin

The University's new chemistry building "will allow us to provide our students an educational environment which will be second to none," said Heinz Floss, chairperson and professor of chemistry, during groundbreaking ceremonies May 14.

Floss said Ohio State "has long prided itself in maintaining one of the premier chemistry departments in the country. Our challenge is to preserve this excellence and to further improve on it. The building for which we are breaking ground today will greatly help us meet this challenge."

Speaking during the ceremonies, Ohio Gov. Richard F. Celeste said the new building will enable the chemistry department to continue to be "a pacesetter which commands national and international respect. The standards which are set here will be standards that other departments at The Ohio State University and at other universities across this state aspire to match," Celeste said.

The $16.4 million building project, funded by state capital appropriations, is scheduled for completion in early 1986. It will include general chemistry teaching laboratories, organic, laser and spectrometer laboratories, classrooms, offices and support facilities.

The structure, to be located on West 18th Avenue between McPherson and Evans laboratories, will be able to accommodate approximately 4,300 students and 150 instructors daily.

Plans call for two distinguished faculty members to be among the occupants of the new building. Associate Provost Elmer F. Baumer introduced Terry A. Miller, who will be recommended for appointment as Eminent Scholar in Experimental Physical Chemistry. (See "Eminent Scholars" story on page 1.)

Also at the event, Floss announced a fund-raising drive that will complete the creation of a $250,000 endowed professorship honoring Melvin S. Newman, professor emeritus of chemistry. The campaign has a goal of $100,000.

Contributions will be matched on a one-for-two basis by the $50,000 Poulk Memorial Fund, an existing Ohio State endowment created by a former chemistry professor. The University received about $100,000 in gifts when Newman retired in 1978.

When the campaign is completed, the resulting endowment will support a full-time chemistry faculty member, most likely in organic chemistry.

Newman joined the faculty in 1936. He was one of the first three Regents Professors at Ohio State, received the University's highest award for service, the Sullivant Medal, in 1976, and an honorary doctoral degree in 1979. He was elected to the National Academy of Sciences in 1956.
THE NEW CHEMISTRY BUILDING is taking shape right on schedule. Its top floor should be completed in early November with the shell finished prior to winter. Once the outside's complete, the work will begin on the inside, and it will be summer of 1986 before the building is ready for occupation.
A welder works on the new chemistry building now under construction on 18th Avenue.
Chem lab unfinished

By Laura Briedis
Lantern staff writer

Even though the construction of the new chemistry building looks complete from the exterior, classes are not scheduled to begin in the building until next summer.

The building, which was designed by architects Kellam and Associates of Columbus, is located on West 18th Avenue where the old McPherson Sawtooth Chemistry Laboratory was located.

The older portion of McPherson has been torn down, but part of it still remains.

Most of the classes that were located in the Sawtooth building have been moved to Rightmire Hall, Evans Laboratory, and the remaining portion of McPherson during the construction, Mathews said.

Construction workers are currently installing the laboratory cabinets and countertops, plumbing, heating and electricity in the new building, said Barbara Koelbl, project coordinator of McPherson (Sawtooth) Chemistry Laboratory.

The new chemistry building will be named after it is occupied, said Al Mathews, administrative manager of the chemistry department.

The building will primarily be used by undergraduates for general and organic chemistry classes.

The five-floor building will be connected to Evans and McPherson laboratories by glass-enclosed walkways, he said.

There will be administration offices, classrooms, a learning resource center and a storeroom for equipment and chemicals on the first floor.

The second and third floors will house 12 general chemistry laboratories and eight faculty offices.

There will be six organic chemistry labs and a safety laboratory on the fourth floor.

The fifth floor will contain the mechanical room for operating the building's system, Mathews said.

A laser spectroscopy, which examines the properties of materials, will be located in the basement.

The $15.7 million construction cost of the new building was appropriated by the state legislature.
Ohio State University will dedicate its new $16.4 million chemistry building at 3:30 p.m. Friday (10/3) in Room 100 of McPherson Chemical Laboratory, 140 W. 18th Ave.

President Edward Jennings, Provost Myles Brand, and Daniel Galbreath, chairman of the Board of Trustees, will head the list of dignitaries at the ceremonies. After the dedication, a tour of the four-story structure at 120 W. 18th Ave. will be conducted.

The ceremonies coincide with the chemistry department's annual Industrial Associates Chemistry Program, which will run from Thursday (10/2) to Saturday (10/4). The program will feature presentations by guest speakers from the chemical industry. Attending the program will be chemistry teachers from colleges and high schools throughout Ohio.

The new building features state-of-the-art laboratories for use by undergraduate students taking general or organic chemistry courses. It was completed July 1, a little more than two years after groundbreaking ceremonies were held. During autumn quarter, the building will be used by some 3,200 students in 130 sections of chemistry courses.

The new building and its ultramodern facilities are the culmination of nearly two decades of work by the faculty in the chemistry department. Efforts began in 1967 to replace the portion of McPherson Lab that formerly stood on the site. This structure, with its antiquated labs, was finished in 1922 and was popularly known as Sawtooth for the shape of its roof. An addition was completed two years later. The section of McPherson Lab that remains standing west of the new building was finished in the late 1920s.

The state appropriation to construct the new building was approved in 1981. Sawtooth was demolished during the 1983-84 school year. Groundbreaking ceremonies were held in the spring of 1984.

Designed by the Columbus architectural firm of Kellam & Johnson Inc., the four-story steel structure is slightly smaller
than Sawtooth. There are 97,900 gross square feet in it, compared to the 112,000 in Sawtooth.

The building has 18 labs, six on each of the three upper floors. Twelve are for general chemistry use and six are for organic chemistry. The first floor is used for offices and classrooms. Laser research labs are in the basement.

It also has a special lab for waste disposal and an improved ventilation system to filter out the noxious fumes that are common to any chemistry laboratory.

The building also is linked to the past. Enclosed walkways on the second and third floors connect it with the remaining portion of McPherson Lab. Walkways connect it with Evans Lab, as well.

For more information on the dedication, contact Professor Devon Meek, chairperson of the Department of Chemistry, at (614) 292-0097.

UNIVERSITY COMMUNICATIONS
The new chemistry building, located on W. 18th Ave., opens this summer and will feature explosion relief panels and a vibration-free basement.

By Mary Hartshorn
Lantern staff writer

Ohio State's new chemistry building on 18th Avenue does not look much different than other new brick buildings, but it has some unusual features, including a vibration-free basement.

The $13,774,809 building, scheduled to open summer quarter, was designed to assure the precision of experiments and the safety of its occupants, OSU architect Richard Eschliman said.

He said vibrations are not transmitted to the basement, because the basement is separated from its foundation. Sand inside the foundation supports the basement. The separation prevents the supports, walls and foundation from touching the basement floor.

A.L. Mathews, administrative manager of chemistry, said the basement needs to be free of vibrations, because sensitive equipment, such as lasers, will be housed there. Vibrations will distort laser beams, he said.

Explosion relief panels are on the first-floor level roof, Eschliman said. The panels, which look similar to skylights on a roof, will open outward in an explosion or fire to prevent damage to the building and injury to its occupants, he said.

Because of the type of equipment to be used in the building, a heavy-duty electrical capacity was installed. Eschliman said more than 300,000 cubic feet of air will be circulated in and out of the building every minute for ventilation in the labs.

Mathews, a member of the planning committee, said the building will use three megawatts of electricity when all systems are operating. This is enough electricity to serve from 400 to 1,000 homes, he said. The air conditioning capacity is comparable to that of a building 10 times its size.
Chemistry building opens laser facility

By Crystal Benzie
Lantern staff writer

A new Laser Spectroscopy facility, located in the basement of the new chemistry building at 120 W. 18th Ave., was unveiled Wednesday in a ceremony in front of the building.

Spectroscopy is the study of the interaction of radiation and matter. Visible radiation is called light. Spectroscopy uses radio and ultraviolet radiation.

Featured speaker Gov. Richard F. Celeste said the new facility "will enable Ohio State University graduate students in chemistry to use the most modern equipment available to gain a wealth of experience and insight into this vital new area."

Other speakers included William Coulter, chancellor of the Ohio Board of Regents; Daniel Galbreath, chairman of the Ohio State University Board of Trustees; Jack Holland, vice president for Research and Graduate Studies; and Heinz Floss, professor and chairman of the chemistry department.

The laser spectroscopy facility will be used for the study of the interaction of radiation molecules, light and matter, said Terry Miller, the university's first eminent scholar and faculty coordinator of the facility.

The facility will be used by faculty and graduate students.

Miller, a specialist in laser spectroscopy, said the new state-of-the-art facility is one of the largest and best equipped university-based laser laboratories in the country.

"By next fall, roughly 25 graduate students will be working daily on their degrees in this facility," Miller said.

"They will have an outstanding opportunity to learn the skill and gain the understanding which will allow them to play key roles in future technological revolutions."

Laser spectroscopy is used in cancer research, research involving impurities or toxic materials in compounds, improving the production of gasoline and other chemicals from coal and oil, efficient batteries and fuel cells and the production of integrated circuits.

The facility took three years to complete at a cost of $1.5 million and was funded by an appropriation from the state of Ohio.

The dedication coincided with the university's 41st Annual Symposium on Molecular Spectroscopy held June 16-20. About 400 scientists from 12 countries attended the symposium.

"I believe that the Laser Spectroscopy Conference will forge a unique partnership here at Ohio State. For over 40 years, each summer, the leading spectroscopists of the world have gathered here to discuss their latest work," Miller said.
DEVON MEEK, CHAIRPERSON of the Department of Chemistry, in front of Sawtooth Lab’s replacement.
CAMPUS WELCOMES MULTI-MILLION DOLLAR CHEMISTRY BUILDING

By Robert Geichion, University Communications

Ohio State University's new multi-million dollar chemistry building, dedicated Friday, features state-of-the-art laboratories for use by undergraduate students taking general or organic chemistry courses. The $16.4 million structure was completed July 1, a little more than two years after groundbreaking ceremonies were held. Gov. Richard Celeste was among the notables expected to attend Friday's dedication ceremony.

The building and its ultramodern facilities are the culmination of nearly two decades of work by the faculty in the chemistry department. Devon Meek, professor of chemistry and department chairperson, said efforts to replace the building popularly known as the Sawtooth, with its ancient labs, began in 1967. The Sawtooth portion of McPherson Lab was finished in 1922. An addition was completed two years later. The section of McPherson Lab that remains standing west of the new building was finished in the late 1920s.

Funding for the new building was approved in 1981. The Sawtooth was demolished during the 1983-84 school year and groundbreaking ceremonies were held in the spring of 1984.

Designed by the Columbus architectural firm of Kellam & Johnson Inc., the four-story steel structure is slightly smaller than the Sawtooth. There are 97,900 gross square feet in the new building, compared to the 112,000 in the Sawtooth.

The building has 18 labs, six on each of the three upper floors. Twelve are for general chemistry use and six are for organic chemistry. The first floor is used for offices and classrooms. Laser research labs are in the basement.

McPherson now has a special lab for waste disposal and an improved ventilation system to filter out the noxious fumes that are common to any chemistry laboratory. The building also is linked to the past. Enclosed walkways on the first and second floors connect it with the remaining portion of McPherson Lab. Walkways connect it with Evans Lab, too.

Meek, who has been at Ohio State for 26 years, is quite pleased with his new baby. Scheduled for completion last January, the building was not finished until after the beginning of summer quarter. But classes were held during the summer in what Meek called a "shakedown cruise" for the building. The 300 or so students who were in 15 lab sections this summer are dwarfed by the 3,200 students in 130 sections expected to use it this fall.

"It's a first-rate facility," says Meek. "We've got a first-rate building now for first-rate faculty."

Students conduct chemistry experiments and record their results in McPherson Lab in 1979. Antiquated facilities such as these have been replaced by a modern $16.4 million structure, which was dedicated Friday.
Scott Barnes, a senior from Paulding, performs an experiment on the process of vaporizing using the facilities in the new chemistry building at 120 W. 18th Ave. The building was dedicated Friday afternoon.

$16.4 million chemistry building includes state-of-the-art laser labs

By Gary Weller
Lantern staff writer

After 20 years of planning and two years of construction, the new $16.4 million chemistry building at 120 W. 18th Ave., was officially dedicated Friday afternoon.

The dedication was attended by members of the Ohio State Board of Regents, Board of Trustees and current and former administrators.

The project to replace the former chemistry building, "Sawtooth," began in 1967. But subsequent budget cuts and a capital appropriations freeze delayed the start until April 1984.

The building was finished in July and is open this quarter for general classes and organic chemistry.

The five-story building has 18 labs, a video tape production and transmission center and one of the world's largest and best equipped laser labs.

The 12 general chemistry labs can accommodate 5,000 students, even though only about 3,200 students use the labs a quarter.

The original building was nicknamed "Sawtooth" because of the shape of its roof. It was built in 1922 and was intended to be only a temporary building, said Devon Meek, chairman of the Chemistry Department.

In conjunction with the dedication, a special symposium was held Friday. "Issues in Chemical Education" featured four internationally known scholars: Thomas Lippincott, professor at the University of Arizona; Basam Shakhashiri, of the National Science Foundation and professor at the University of Wisconsin; John Moore, professor at Eastern Michigan University, and Glenn Crosby, professor at Washington State University.

"The classrooms, laboratories, offices and the state-of-the-art support systems in this building will further enhance the quality of an already outstanding program of instruction and research in chemistry," said Daniel Galbreath, chairman of the OSU Board of Trustees.

President Edward H. Jennings said Ohio State has one of best chemistry departments in the world and the new facility would enhance the university's drive toward excellence.

"Our (laser) lab is among the top three or four in the world," said Terri Miller, Ohio Eminent Scholar in experimental physical chemistry and professor of chemistry. "We've got a water cooling system for the 20 lasers, and a megawatt of power coming into the basement."

Some of the research in the laser lab will investigate the intermediate reactions within long sequences of complex chemical reactions. Miller said some of the sensitive laser spectroscopy techniques are particularly useful for probing certain rare and short-lived reactions.

The video center on the ground floor is a small production studio. Training tapes can be produced and transmitted to the labs upstairs or in other buildings. The labs on the upper three floors have video monitors and large-screen TV projectors.
RICHARD F. CELESTE LABORATORY OF CHEMISTRY

Richard F. Celeste

On April 7, 1995, the Board of Trustees named the chemistry building at 120 West 18th Avenue, the Richard F. Celeste Laboratory of Chemistry in recognition of Governor Celeste's twenty years of dedicated public service to the citizens of Ohio as legislator, lieutenant governor, and governor.

Richard F. Celeste culminated a distinguished political career after two terms as Ohio's 64th governor from 1983 to 1991. Throughout his tenure, he helped strengthen partnerships between education, industry, and government that will guide us into the next century. His commitment to the role of government in developing science, research, and technology policy led to the first exclusively state-funded supercomputer center. He established Ohio's Thomas Edison program linking U.S. industry with Ohio's nonprofit, federal, and university-based research capabilities. Under his leadership, the Selective Excellence Program was launched. The Eminent Scholar and Academic Challenge programs, both principal components of the Selective Excellence Program, continue to benefit the Department of Chemistry at Ohio State.

Governor Celeste's continued dedication to science and research in higher education and his support of Ohio State are commemorated here on this day, December 1, 1995.

RICHARD F. CELESTE
LABORATORY OF CHEMISTRY

NAMING CEREMONY
DECEMBER 1, 1995

THE OHIO STATE UNIVERSITY
The Richard F. Celeste Laboratory of Chemistry and its ultramodern facilities were the culmination of nearly two decades of work by the faculty in Ohio State's chemistry department. The building, finished in 1986, replaced the “Sawtooth,” the original antiquated facility.

The $16.4 million structure is 97,900 gross square feet and has eighteen labs, six on each of the three upper floors. Twelve are for general chemistry use, and six are for organic chemistry. Laser research labs are in the basement. This facility now has a special lab for waste disposal and an improved ventilation system to filter out the noxious fumes that are common to any chemistry laboratory. It was designed by the Columbus architectural firm of Kellam and Johnson, Inc.

The Richard F. Celeste Laboratory of Chemistry is linked to the past as well as the future. Walkways connect it with the remaining portion of McPherson Laboratory, as well as the new addition to Evans Laboratory, the Newman and Wolfson Laboratory of Chemistry.

The Richard F. Celeste Laboratory of Chemistry, the naming of which we celebrate today, is a state-of-the-art facility which provides a firm foundation for the future. It serves 3,200 students in 130 sections of chemistry each quarter.

THE NAMING CEREMONY

Welcome
Matthew S. Platz
Chair, Department of Chemistry
The Ohio State University

Remarks
Holly Lavender
Graduate Student
Department of Chemistry
The Ohio State University

Terry A. Miller
Ohio Eminent Scholar and Professor
Department of Chemistry
The Ohio State University

James C. Garland
Dean, College of Mathematical and Physical Sciences
The Ohio State University

E. Gordon Gee
President
The Ohio State University

Ambassador Milton Wolf
Chair, Board of Trustees
The Ohio State University

The Honorable Richard F. Celeste
Former Governor
State of Ohio

Plaque Unveiling
Ambassador Milton Wolf
E. Gordon Gee

Closing
Matthew S. Platz

Refreshments will be served on the third floor of the Richard F. Celeste Laboratory of Chemistry. Laboratory rooms 312 and 320 will be open for you to test. Students and faculty members from the Department of Chemistry will be available to answer any of your questions.
E. Gordon Gee
President of
The Ohio State University

along with
James C. Garland
Dean, College of Mathematical and Physical Sciences

and
Matthew S. Platz
Chair, Department of Chemistry

cordially invite you to
celebrate the naming of the
Richard F. Celeste
Laboratory of Chemistry

Friday, December 1, 1995
2:00 to 4:30 p.m.

Richard F. Celeste Laboratory of Chemistry
120 West 18th Avenue
Second Floor Lobby
The Ohio State University

For further information, call (614) 292-1872.