Harvard power plant causes carcinogen controversy

By Jake Tindo

The cancer-causing potential of Harvard University's Medical Area Total Energy Plant (MATEP) is the sole remaining issue in the university's seven-year-old battle to begin full operation of the plant, according to Robert H. Scott, vice-president for administration at Harvard University.

MATEP was designed to provide electricity and steam to a dozen hospitals, medical centers and schools near the Harvard Medical School. Users would pay rates identical to those of the Boston Edison Company, Scott said.

The MATEP facility, which replaces an old plant torn down in 1976, has cost Harvard University more than $250 million, according to Scott.

The plant produces polycyclic aromatic hydrocarbons (PAHs), a known carcinogen common to all combustion methods, according to community opponent Michael Lambert. Massachusetts acted improperly when it gave Harvard permission to test for PAH, he claimed.

Brookline opponents disagreed with a state ruling but declined to challenge the decision in court due to a lack of funds, Lambert said.

The facility is located near the Mission Hill and Brookline communities. Residents of those communities have prevented Harvard from operating the six diesel engines which provide power to MATEP's electrical generators because diesel engines may produce toxic and carcinogenic substances, Scott said.

The PAH testing program was not subjected to outside review and Harvard has not allowed community opponents to observe or participate in the design and implementation of that testing, Lambert said.

Analyze is preparing equipment which will measure the level of carcinogens emitted from the MATEP diesels. The actual testing process will take a few days, he added. The Massachusetts Department of Environmental Quality Engineering (DEQE) will conduct hearings to evaluate the test results, Scott said.

Discouraged by the lengthy court battle, most Mission Hill community opponents have become disinterested and apathetic, Lambert said.

"The activists have all seemed to have gone to sleep over this, at least for the time being," he remarked. "Until the preparation has begun for the upcoming hearings on the carcinogen issue, Mission Hill will have little or no chance to present a substantive and technically competent case on the arguments surrounding this issue."

MATEP's first obstacle came when the plant opened in 1976, according to Scott. The levels of nitrogen dioxide pollutants produced by the diesels had to be tested to determine whether they met an acceptable level.

The DEQE evaluated the test results in a series of public hearings and ruled the plant safe for operation, he said.

The Massachusetts Supreme Judicial Court chose to uphold the DEQE approval of the plant on the nitrogen dioxide issue despite being fully aware of procedural irregularities.

The court, saying it lacked technical expertise, did not want to "second guess" the DEQE in matters inside the agency's "presumed expertise," Lambert said.

The MATEP facility is currently the world's largest cogeneration plant. Unlike conventional power plants, cogeneration plants produce electricity and steam simultaneously, Scott explained, and are approximately 30 percent more efficient than their conventional counterparts. The diesels' exhaust can either be piped to provide free steam or recycled through a heat recovery system to run electrical generators, he said.

The plant has never been shut down, he added, and it has provided chilled water and steam for two years using electricity from Edison.

The university announced plans last month to refinance the plant with tax-exempt bonds issued by the Massachusetts Health and Educational Facilities Authority.

MATEP, the world's largest co-generation plant has caused much controversy between Harvard and the surrounding community.