Mesothelioma

The U.S. government reports that 70% to 80% of all cases of mesothelioma occur in people with a traceable history of exposure to asbestos. These numbers are from epidemiological surveys. There is a good chance that many of the remaining mesothelioma cases are also due to asbestos, but that the patient could not identify exactly where or when the asbestos fiber exposure occurred.

Mesothelioma is a very tough cancer. Most patients undergo surgery and chemotherapy. Sometimes radiation therapy is employed, including innovative techniques such as tomotherapy and intensity modulated radiation therapy. Oncologists use Brachytherapy for targeted radiation treatment of the tumor. The antifolate drug pemetrexed (Alimta) in combination with cisplatin has been embraced by many mesothelioma specialists. Median survival time, even with good medical care, is fairly low.

Effusions into the bodily cavities is a common symptom. The chest, or pleural cavity, gets effusions, as well as the peritoneal (abdominal) cavity, depending on the site and shape of the tumor. Mesothelioma is classified as either pleural (the most common type) or peritoneal, depending on the location of the disease. (There are other types, but pleural and peritoneal are the most common.) To diagnose mesothelioma, the doctor takes a sample, usually of the pleural fluid, and conducts a biopsy in a lab. Immunohistochemical markers are employed in biopsy to distinguish mesothelioma from adenocarcinoma. These markers are usually glycoproteins.

Other markers can be detected in the blood to help identify mesothelioma. Soluble mesothelin-related (SMR) proteins released by mesothelioma cells are distinctive enough to show up in the blood, if the appropriate test is conducted. However, definitive diagnosis still requires a laboratory biopsy.

Tests and trials with gene therapy and immunotherapy are sometimes done on mesothelioma cases, but the standard cancer treatment modalities of surgery, radiation, and chemotherapy remain the most used techniques in mesothelioma treatment.

More: http://www.mesotheliomaweb.org