United States Department of Labor
Employees' Compensation Appeals Board

C.P., claiming as widower of H.P., Appellant	)	
and	)	**Docket No. 10-1345**
	)	**Issued: April 13, 2011**
TENNESSEE VALLEY AUTHORITY, WESTERN AREA RADIOLOGICAL LABORATORY, Muscle Shoals, AL, Employer	)	

Appearances:
Appellant, pro se
Office of Solicitor, for the Director

Case Submitted on the Record

DECISION AND ORDER

Before:
ALEC J. KOROMILAS, Judge
COLLEEN DUFFY KIKO, Judge
JAMES A. HAYNES, Alternate Judge

JURISDICTION

On April 15, 2010 appellant filed an appeal of a merit decision of the Office of Workers' Compensation Programs dated January 13, 2010 denying his claim for death benefits. Pursuant to the Federal Employees' Compensation Act[1] and 20 C.F.R. §§ 501.2(c) and 501.3, the Board has jurisdiction over the merits of this case.

ISSUE

The issue is whether appellant has established that the employee's death was causally related to factors of her federal employment.

FACTUAL HISTORY

The employee, a radiological chemist, died November 19, 2005 at the age of 26. The death certificate listed the cause of death as acute hemorrhage laryngotracheobronchitis due to or

[1] 5 U.S.C. §§ 8101-8193.

as a consequence of toxic shock syndrome and Waterhouse-Friderichsen syndrome. The November 19, 2005 final pathology report showed nonspecific inflammatory involvement with a very superficial infiltrate of lymphoid cells and rare plasma cells in the larmina propria. Appellant, the employee's husband, filed a claim for survivor's benefits (Form CA-5) on September 10, 2006 alleging that the employee was exposed to toxic fumes during the course of her employment and that this caused or contributed to her death. Appellant asserted that the employee handled a wide range of strong acids on a regular basis during the course of her work and that she had increasing problems with respiratory infections and sore throats. He stated that her symptoms worsened when she was at work and improved when she was away from the laboratory.

Appellant submitted numerous test results as well as medical records from 2001 to the time of death. In an August 29, 2006 report, Dr. J. Alan Barksdale, a Board-certified pathologist and the examining pathologist, noted that the employee's work history indicated exposure to a variety of potentially toxic and known toxic fumes. He stated that since there was a postmortem finding of erosive laryngotracheobronchitis, it must be considered that respiratory exposure to the substances could have been a significant factor in evolution of the disease process, as contact with some of these compounds is directly associated with laryngotracheobronchitis.

The employing establishment contested the claim. It submitted reports from Dr. Brenda Shome,[2] a Board-certified endocrinologist, Dr. Stephen S. Hawkins,[3] Board-certified in infectious disease, and Dr. Stephen Adams,[4] a Board-certified pathologist, who opined that the

[2] In a November 14, 2006 report, Dr. Shome noted that the employee died from a bacterial infection of the trachea and bronchus complicated by Waterhouse-Friederichsen syndrome with adrenal insufficiency. The employee may have had preexisting pituitary disease that led to adrenal insufficiency before hemorrhage occurred. Dr. Shome noted that the employee died from bilateral adrenal hemorrhage that damaged her ability to produce mineralocorticoid. This led to circulatory collapse on the day she died. This kind of hemorrhage was historically linked to bacterial sepsis. Dr. Shome opined that there was no connection between this event and any occupational hazard in working with chemicals. She explained if the employee was accidentally exposed to fumes, she would have had more nasal burning symptoms, as this would have been the initial entry of the fumes. Dr. Shome noted that the employee's only nasal bleeding occurred during pregnancy, which is expected, and did not recur after she gave birth.

[3] In a November 13, 2006 report, Dr. Hawkins reviewed the employee's medical records and opined that the cause of her sepsis (toxic effects of systemic infection) appeared to be a bacterial laryngotracheobronchitis. He stated underlying adrenal insufficiency probably played a significant role in her shock syndrome and was compounded by the hemorrhage into the adrenal glands which occurred. Dr. Hawkins noted there were multiple indications in the records to suggest a significant underlying endocrine disorder. He opined there was no convincing evidence that workplace exposure to fumes led to her upper respiratory inflammation that led to her experiencing the fatal infection. Dr. Hawkins noted the records showed an unremarkable pattern of sporadic upper respiratory symptoms and infections. There was no evidence of any breakdown in safety procedures in the workplace.

[4] In an October 30, 2006 report, Dr. Adams noted the medical record did not support ongoing chronic symptoms during her employment, but rather implied episodic infections typical for a young adult. He noted the inflammation evident at the time of autopsy suggested gastroesophageal reflux. Dr. Adams noted that the employee's death was due to infection and there was no evidence of a major exposure resulting in inhalation of acidic fumes that could potentially lead to an entry for bacteria. He stated the examining pathologist's narrative noted compliance with safety procedures, specifically the use of fume hoods, with no evidence of hood malfunction. Dr. Adams further opined there was no link between fume exposure and Waterhouse-Friderechsen syndrome. He opined the employee's susceptibility to life threatening infection was based on possible preexisting endocrine disease as her medical record and autopsy contained evidence of multiple endocrine abnormalities.

employee's illness and death were not related to her employment. It also stated that there was no evidence of fume hood malfunction or of major exposure to the offending chemicals and provided a list of hood flow measurements and dates of pyrosulfate fusions. In a September 10, 2006 statement, appellant asserted that the hoods were not set properly and that other employees could confirm that there were hood malfunction episodes.

In a March 23, 2007 decision, the Office denied the claim on the grounds the medical evidence did not show that the death resulted from the work factors. It noted that there was no evidence of excessive exposure, of hood malfunction, or of safety violations.

On April 20, 2007 appellant requested an oral hearing. In a September 25, 2007 report, Dr. Mangesh Shukla, a Board-certified gastroenterologist, noted treating the employee from 2002 until she passed away in November 2005. He stated she underwent an uneventful colonoscopy and upper endoscopy on November 18, 2005, which showed no major abnormalities. The employee did well after the procedure and was discharged home where she later developed nausea and a headache. She passed out the next day and could not be revived. Dr. Barksdale's autopsy, performed a few hours after death, revealed acute and chronic laryngotracheobronchitis. Dr. Shukla advised that the employee's past medical history was significant for episodes of pneumonia and bronchitis, which required outpatient and inpatient treatment, and that she had frequent burning chest pain under the breast bone that was unresponsive to standard heartburn drugs. He stated that he was made aware that her job required her to add concentrated sulfuric acid to some samples, heat it to a high temperature and it was very likely that she was exposed to fumes of sulfuric acid on a regular basis. Dr. Shukla opined that the employee's symptoms of burning chest pain and episodes of bronchitis and pneumonia were due to sulfuric acid exposure, and the resultant injury to her trachea and bronchial tree. He stated her occupational exposure may also explain the autopsy finding of laryngotracheobronchitis. Dr. Shukla explained that, had the employee's chest pain been due to gastroesophageal reflux disease, it should have resolved upon treatment with Nexium.

In an October 16, 2007 report, Dr. Barksdale opined that the most likely causation of the erosive acute and chronic laryngotracheobronchitis, with a superimposed acute phase leading to demise, was exposure of the upper airway to toxic or caustic substances, such as chronic aspiration of gastric acid, repetitive inhalant exposure of a quite irritating nature, as well as exposure of the employee to pathogens which would have resulted in a primary effect in the larynx and tracheobronchial tree. He opined that, with the employee's occupational history of exposure to toxic aerosols or fumes, such exposure was the most likely proximate cause of the laryngotracheobronchitis since Dr. Shukla's findings clinically ruled out a condition of reflux disease and chronic aspiration. Dr. Barksdale stated that, with the assumption that there was sufficient exposure of an ongoing type, he concluded that the occupational exposure was a predominant or a primary etiologic factor.

In a September 7, 2007 decision, an Office hearing representative found the case not in posture for a hearing and directed further medical development.

The Office prepared a statement of accepted facts and referred the employee's record, a list of questions and the statement of accepted facts to Dr. Nilesh Hingarh, Board-certified in infectious disease, for a second opinion. In an October 4, 2007 report, Dr. Hingarh stated it was

possible that the employee's work-related chemical exposure played a role in her death. He noted that since the employee's work was in compliance with hood flow and safety requirements, it was less likely that she had any significant chemical exposure that would lead to the underlying lung injury. Nonetheless, Dr. Hingarh opined that the employee's pathological changes in her lung, although nonspecific, might be related to possible toxin exposure as stated by Dr. Barksdale. He noted it was also possible that her underlying tracheobronchitis made her more susceptible to pulmonary infections, leading to the infection at the time of death. Dr. Hingarh concluded that the employee's work-related exposures "may have caused some nonspecific chronic laryngotracheobronchitis that may have predisposed her to develop a pulmonary infection that led to her septic shock syndrome. Appellant's underlying endocrinopathies (not related to her work exposures) made it difficult for her to survive such an infection and played a major role in her death." In a November 1, 2007 clarification report, Dr. Hingarh opined that the employee sustained some level of injury to her lungs from her work-related exposures that predisposed her to develop her recurrent upper respiratory tract infections and the pneumonia that led to her death.

In a January 8, 2008 clarification report, Dr. Hingarh stated a patient could present with symptoms the employee had after potential chemical exposures at work. He stated that based on pathology reports, the employee had some underlying inflammatory lung disease. Dr. Hingarh opined that this underlying pulmonary disease may have been caused by her exposure to fumes related to her work or other exposures not outlined in the history. He stated that, while it was impossible to say with 100 percent confidence that her lung disease was caused by possible work-related exposures, it needed to be considered as a possible underlying factor.

In a January 8, 2008 decision, the Office denied the claim finding that the evidence failed to establish a causal relationship. It found there was no evidence that the employee's work environment was not safe, there was no contemporaneous evidence of an exposure mishap at work, there was no evidence that the employee advised her physicians that she was or could have been exposed to something at work, and there was no evidence of a significant exposure at work.

Appellant requested an oral hearing that was held May 21, 2008. Affidavits from coworkers noted incidents of fume hood malfunctioning, resulting in the employee's fume exposure. In a June 13, 2008 letter, William L. Raines, manager, noted that, while the employee had an acidic solution splash out onto her lab coat, she had no acid burns to her skin and there was no radioactive contamination. He stated that the liquid spill did not present a risk of inhalation exposure. Mr. Raines advised that lab personnel were trained to stop work and leave the area if it was suspected that hood operation was improper.

In a July 22, 2008 decision, a hearing representative vacated the prior decision finding that the evidence reflected that the employee had been exposed on at least one or more occasion to gases and fumes at work. The Office was directed to further develop the factual evidence, modify the statement of accepted facts and refer the record to another second opinion specialist.

In an October 10, 2008 statement of accepted facts, the Office noted coworker statements about two fume exposure incidents involving the employee. It stated that there was no evidence of safety violations or hood malfunctions. The Office referred this statement and the record to Dr. Ann MacIntyre, Board-certified in infectious disease, for a second opinion. In an

October 31, 2008 report, Dr. MacIntyre concluded, "Overall, the nature of [the employee's] employment did not directly cause her death from acute or chronic bacterial laryngotracheal bronchitis. One could argue that the patient could have inhaled toxic fumes that led to damage of the tracheobronchial mucosa leading to the greater facility of bacterial to lead to invasive infection. However, based on the evidence provided, there were no formal reports of acid or other toxic exposure. There are two reports from coworkers of incidents occurring at unclear times during which fumes were noted and personnel exited the work area though no formal reports of this are provided. Additionally, there is no evidence of hood malfunctions or other safety violations. Consequently, as there is no clear evidence of toxin exposure, I conclude there is no clear evidence that Ms. Porter's death was causally related to her federal employment."

In a November 10, 2008 decision, the Office denied the claim based on Dr. MacIntyre's opinion.

On December 5, 2008 appellant requested an oral hearing. By decision dated March 17, 2009, an Office hearing representative vacated the November 10, 2008 decision, finding that Dr. MacIntyre's report was based on an inaccurate statement of accepted facts. The Office was directed to rewrite the statement of accepted facts to state that on two occasions the fume hoods malfunctioned while the employee was working, causing exposure to toxic fumes of brief duration. It was then directed to request clarification from Dr. MacIntyre.

A new statement of accepted facts was prepared on March 24, 2009 and the Office requested a clarification opinion from Dr. MacIntyre. In a May 1, 2009 report, Dr. MacIntyre advised that her review of the March 24, 2009 statement of accepted facts did not alter her earlier opinion of October 31, 2008. She stated that while it is now accepted as factual that the employee was exposed to toxic fumes on two occasions between 2001 and 2004, such exposure predated her death by at least one year and there was no evidence of chronic respiratory complaints, as noted by several medical notes. Additionally, there was no evidence of acute exposure to toxic fumes immediately prior to her death. Dr. MacIntyre opined that since there was no evidence of acute toxin exposure, the employee's death was not causally related to her federal employment.

By decision dated May 7, 2009, the Office denied the claim for survivor benefits based on Dr. MacIntyre's May 1, 2009 opinion.

On June 4, 2009 appellant requested a hearing, which was held telephonically on October 6, 2009. The Office received evidence previously of record along with a September 25, 2009 statement from appellant's attorney.

By decision dated January 13, 2010, an Office hearing representative affirmed the May 7, 2009 decision.

LEGAL PRECEDENT

An award of compensation in a survivor's claim may not be based on surmise, conjecture or speculation or an appellant's belief that the employee's death was caused, precipitated or

aggravated by the employment.[5] Appellant has the burden of establishing by the weight of the reliable, probative and substantial medical evidence that the employee's death was causally related to an employment injury or to factors of his employment. As part of this burden, she must submit a rationalized medical opinion, based upon a complete and accurate factual and medical background, showing a causal relationship between the employee's death and an employment injury or factors of his federal employment. Causal relationship is a medical issue and can be established only by medical evidence.[6]

The medical evidence required to establish causal relationship is rationalized medical evidence. Rationalized medical evidence is medical evidence which includes a physician's rationalized medical opinion on the issue of whether there is a causal relationship between an employee's diagnosed conditions and the implicated employment factors. The opinion of the physician must be based on a complete factual and medical background of the employee, must be one of reasonable medical certainty and must be supported by medical rationale explaining the nature of the relationship between the employee's death and the accepted conditions or employment factors identified by the employee.[7]

Section 8123(a) of the Act provides in pertinent part: If there is disagreement between the physician making the examination for the United States and the physician of the employee, the Secretary shall appoint a third physician who shall make an examination.[8] In situations where there exist opposing medical reports of virtually equal weight and rationale and the case is referred to an impartial medical specialist for the purpose of resolving the conflict, the opinion of such specialist, if sufficiently well rationalized and based upon a proper factual background, must be given special weight.[9]

ANALYSIS

Appellant claimed that the employee's death on November 19, 2005 was causally related to her federal employment as her exposure to toxic fumes while working as a chemist caused or contributed to her death. The Office relied on Dr. MacIntyre's May 1, 2009 report in finding that the employee's death was not caused or contributed to by her federal employment. The postmortem finding revealed the employee had erosive laryngotracheobronchitis and the record supports two incidents of toxic fume exposure. The Board finds that there is a conflict in medical opinion between Dr. MacIntyre, for the Office, and Drs. Shukla and Barksdale, for appellant, on the issue of whether the employee's death was causally related to her federal employment.

[5] *Sharon Yonak (Nicholas Yonak)*, 49 ECAB 250 (1997).

[6] *Mary J. Briggs*, 37 ECAB 578 (1986); *Umberto Guzman*, 25 ECAB 362 (1974).

[7] *Donna L. Mims*, 53 ECAB 730 (2002).

[8] 5 U.S.C. § 8123(a).

[9] *Jack R. Smith*, 41 ECAB 691, 701 (1990); *James P. Roberts*, 31 ECAB 1010, 1021 (1980).

In a May 1, 2009 report, Dr. MacIntyre, Board-certified in infectious disease and an Office referral physician, reviewed the employee's medical record and the March 24, 2009 statement of accepted facts, which revealed two occasions the fume hoods malfunctioned and the employee was exposed to toxic fumes of brief duration. She opined that, since there was no evidence of acute toxin exposure, the employee's death was not causally related to her federal employment. Dr. MacIntyre explained that the two accepted occupational exposure to toxic fumes predated the employee's death by at least one year and there was no evidence of acute exposure to toxic fumes immediately prior to her death. She further noted that the medical record contained no evidence of chronic respiratory complaints.

Dr. Shukla, an attending Board-certified gastroenterologist, opined in his September 25, 2007 report that the employee's occupational sulfuric acid exposure caused or contributed to her death. He explained that the employee's job required her to add concentrated sulfuric acid to samples and heat it to a high temperature which exposed her to fumes of sulfuric acid on a regular basis. Dr. Shukla opined that this led to her symptoms of burning chest pain and episodes of bronchitis and pneumonia and the resultant injury to her trachea and bronchial tree, which corresponded to the postmortem finding of erosive laryngotracheobronchitis. He excluded gastroesophageal reflux disease as the proximate cause of the laryngotracheobronchitis since the employee's burning chest pain was not resolved with medication used to treat gastroesophageal reflux disease. Dr. Barksdale, the examining pathologist, advised that since there was a postmortem finding of erosive laryngotracheobronchitis, the employee's occupational exposure was a predominant or primary etiologic factor in the evolution of her disease process, as contact with some of these compounds was directly associated with laryngotracheobronchitis and Dr. Shukla's findings ruled out a condition of reflux disease and chronic aspiration.

Due to the unresolved conflict in the medical evidence, the Board will set aside the Office's decision and remand the case for referral of the employee's record to an impartial medical specialist to resolve the conflict. After such further development of the record as it deems necessary, the Office shall issue a *de novo* decision on whether the employee's death on November 19, 2005 was causally related to the established work-related events.

On appeal appellant argues the evidence of record supports a causal relationship between the employee's employment and her death. As noted, the case is remanded for referral of the employee's record to an impartial medical specialist to resolve the conflict in medical opinion evidence between Dr. MacIntyre and Drs. Shukla and Barksdale regarding this matter.

CONCLUSION

The Board finds that the case is not in posture due to a conflict in medical evidence.

ORDER

IT IS HEREBY ORDERED THAT the Office of Workers' Compensation Programs' decision dated January 13, 2010 is set aside and the case is remanded to the Office for further proceedings consistent with this decision of the Board.

Issued: April 13, 2011
Washington, DC

Alec J. Koromilas, Judge
Employees' Compensation Appeals Board

Colleen Duffy Kiko, Judge
Employees' Compensation Appeals Board

James A. Haynes, Alternate Judge
Employees' Compensation Appeals Board