

**IN THE UNITED STATES DISTRICT COURT
FOR THE SOUTHERN DISTRICT OF ILLINOIS**

TOMMY L. TAYLOR,)	
)	
Plaintiff,)	
)	
vs.)	CIVIL NO. 09-123-GPM
)	
UNION PACIFIC RAILROAD COMPANY,)	
a corporation,)	
)	
Defendant.)	

MEMORANDUM AND ORDER

MURPHY, District Judge:

I. INTRODUCTION

This matter is currently before the Court on a motion to exclude expert testimony (Doc. 51) and a motion for summary judgment (Doc. 53), both brought by Defendant Union Pacific Railroad Company (“UP”). This case is a suit under the Federal Employer’s Liability Act (“FELA”), 45 U.S.C. § 51 *et seq.*, and the Locomotive Inspection Act (“LIA”), 49 U.S.C. § 20701 *et seq.* Plaintiff Tommy L. Taylor claims that on December 28, 2007, he was working as a locomotive engineer for UP, operating Locomotive UP 9315 on a run from Dexter, Missouri, to Dupu, Illinois. Over the course of approximately four hours, according to Taylor, he was exposed to sulfuric acid fumes from a defective, overheating locomotive battery in the cab of UP 9315. As a result of the said exposure, Taylor contends that he suffers from pulmonary disease, specifically, reactive airways dysfunction syndrome (“RADS”). UP now seeks summary judgment on the grounds that Taylor has no competent expert evidence showing that his pulmonary illness is a result of exposure to sulfuric acid fumes aboard UP’s train and Taylor has no evidence showing that he was exposed to a

dangerously high amount of such fumes aboard the train. Having reviewed the parties' submissions carefully, and having conducted a hearing on the admissibility of Taylor's expert evidence on September 13, 2010, the Court now rules as follows.

II. ANALYSIS

1. Legal Standard

The standard under which a court must review a request for summary judgment is well established. Rule 56 of the Federal Rules of Civil Procedure provides, in pertinent part, that “[a] party against whom relief is sought may move, with or without supporting affidavits, for summary judgment on all or part of the claim.” Fed. R. Civ. P. 56(b). The rule provides further that “[t]he judgment sought should be rendered if the pleadings, the discovery and disclosure materials on file, and any affidavits show that there is no genuine issue as to any material fact and that the movant is entitled to judgment as a matter of law.” Fed. R. Civ. P. 56(c)(2). In considering a summary judgment motion, a court must review the entire record and draw all reasonable inferences in the light most favorable to the non-moving party. *See NLFC, Inc. v. Devcom Mid-America, Inc.*, 45 F.3d 231, 234 (7th Cir. 1995); *Enquip, Inc. v. Smith-McDonald Corp.*, 655 F.2d 115, 118 (7th Cir. 1981). *See also Miller v. Herman*, 600 F.3d 726, 733 (7th Cir. 2010) (citing *Reget v. City of La Crosse*, 595 F.3d 691, 695 (7th Cir. 2010)) (“We construe all facts in the light most favorable to [the non-movant] and draw all reasonable inferences in his favor.”). On summary judgment a court may not make credibility determinations or weigh the evidence, because these are tasks for a factfinder. *See Anderson v. Liberty Lobby, Inc.*, 477 U.S. 242, 255 (1986); *Betaco, Inc. v. Cessna Aircraft Co.*, 32 F.3d 1126, 1138 (7th Cir. 1994). In evaluating a motion for summary judgment, “[t]he court has one task and one task only: to decide, based on the evidence of record, whether there

is any material dispute of fact that requires a trial.” *Waldrige v. American Hoechst Corp.*, 24 F.3d 918, 920 (7th Cir. 1994).

In this instance, as noted, one of the bases for UP’s request for summary judgment is that Taylor lacks competent expert evidence with respect to causation. Thus, UP has moved to exclude the evidence of Thomas Hyers and Stephen Nagy, who are physicians that have treated Taylor, and the evidence of Thomas Osimitz, a toxicologist retained by Taylor. This is an appropriate ground upon which to seek summary judgment, which may be granted, of course, on a showing that a party with the burden of proof on an issue lacks competent evidence on that issue. *See Logan v. Commercial Union Ins. Co.*, 96 F.3d 971, 978 (7th Cir. 1996) (quoting *Celotex Corp. v. Catrett*, 477 U.S. 317, 322 (1986)) (“[T]he plain language of Rule 56(c) mandates the entry of summary judgment, after adequate time for discovery and upon motion, against a party who fails to make a showing sufficient to establish the existence of an element essential to that party’s case, and on which that party will bear the burden of proof at trial.”). Thus, the Court turns next to the matter of the admissibility of the evidence of Osimitz, Hyers, and Nagy. In federal court the admissibility of expert testimony in evidence is governed, of course, by the Federal Rules of Evidence, which provide, in relevant part:

If scientific, technical, or other specialized knowledge will assist the trier of fact to understand the evidence or to determine a fact in issue, a witness qualified as an expert by knowledge, skill, experience, training, or education, may testify thereto in the form of an opinion or otherwise, if (1) the testimony is based upon sufficient facts or data, (2) the testimony is the product of reliable principles and methods, and (3) the witness has applied the principles and methods reliably to the facts of the case.

Fed. R. Evid. 702. Rule 702 obligates courts to act as gatekeepers with respect to expert testimony concerning scientific, technical, or other specialized knowledge. *See Daubert v. Merrell Dow*

Pharms., Inc., 509 U.S. 579, 589 (1993); *United States v. Conn*, 297 F.3d 548, 555-56 (7th Cir. 2002). In evaluating the admissibility of evidence under Rule 702, a court must determine whether (1) the proposed witness would testify to valid specialized knowledge and (2) the expert's testimony will assist the trier of fact. See *Kumho Tire Co. v. Carmichael*, 526 U.S. 137, 151-52 (1999); *Ammons v. Aramark Unif. Servs., Inc.*, 368 F.3d 809, 816 (7th Cir. 2004); *Green v. Goodyear Dunlop Tires N. Am., Ltd.*, Civil No. 08-472-GPM, 2010 WL 883653, at *1 (S.D. Ill. Mar. 5, 2010). The first prong of this test requires a court to determine whether the expert is qualified in the relevant field and whether the methodology underlying the expert's conclusions is reliable. See *Daubert*, 509 U.S. at 592; *Masters v. Hesston Corp.*, 291 F.3d 985, 991 (7th Cir. 2002). This calls upon the trial court to assess whether the proffered testimony is both relevant and reliable. See *Kumho Tire*, 526 U.S. at 152; *Jenkins v. Bartlett*, 487 F.3d 482, 489 (7th Cir. 2007). In assessing an expert's methodology, a court should consider: (1) whether the proffered conclusion lends itself to verification by the scientific method through testing; (2) whether it has been subjected to peer review; (3) whether it has been evaluated in light of the potential rate of error of the scientific technique; and (4) whether it is consistent with the generally accepted method for gathering the relevant scientific evidence. See *Cummins v. Lyle Indus.*, 93 F.3d 362, 368 (7th Cir. 1996) (citing *Deimer v. Cincinnati Sub-Zero Prods., Inc.*, 58 F.3d 341, 344 (7th Cir. 1995)); *Bradley v. Brown*, 42 F.3d 434, 437 (7th Cir. 1994). However, these factors may not always be pertinent in assessing the reliability of expert testimony, for the inquiry into the admissibility of expert testimony is a flexible one, and an expert's testimony need not satisfy each of the factors to be admissible. See *Daubert*, 509 U.S. at 592-94; *Chapman v. Maytag Corp.*, 297 F.3d 682, 687 (7th Cir. 2002).

Here it perhaps is appropriate to address the relationship between the federal standard for the admission of expert testimony and the standard of proof of causation under the FELA.¹ Under the FELA, a railroad company is liable in damages to any employee who suffers injury due to the railroad's negligence. *See* 45 U.S.C. § 51. To recover under the FELA, a plaintiff must prove the common-law elements of negligence, including duty, breach, foresee ability and causation, but "the quantum of evidence required to establish liability in a FELA case is much less than in an ordinary negligence action." *Harbin v. Burlington N. R.R. Co.*, 921 F.2d 129, 131 (7th Cir. 1990). *See also Deutsch v. Burlington N. R.R. Co.*, 983 F.2d 741, 743 (7th Cir. 1992) (in a FELA case, to survive summary judgment it is not enough for a railroad employee to show injury in the course of his or her employment by a rail carrier in furtherance of interstate commerce, and instead the employee must show at least slight evidence of the carrier's negligence to create a question for the jury). Under the FELA, a plaintiff must provide a reasonable basis for a jury to conclude that an employer's negligence played any part, even the slightest, in producing the injury for which damages are sought. *See Rogers v. Missouri Pac. R.R. Co.*, 352 U.S. 500, 506-07 (1957); *Coffey v. Northeast Ill. Reg'l Commuter R.R. Corp. (METRA)*, 479 F.3d 472, 476 (7th Cir. 2007); *Lisek v. Norfolk & W. Ry. Co.*, 30 F.3d 823, 832 (7th Cir. 1994). Discretion to engage in common sense inferences regarding issues of causation and fault is exclusively vested with the jury "in all but the infrequent cases where fair-minded jurors cannot honestly differ whether fault of the employer played any part in the employee's injury." *Walden v. Illinois Cent. Gulf R.R.*, 975 F.2d 361, 364 (7th Cir. 1992) (quoting

1. As the Court explained in an earlier order in this case, although Taylor asserts a claim under the LIA, in fact the LIA provides no private right of action; instead, violations of the LIA are vindicated by bringing suit under the FELA. *See Taylor v. Union Pac. R.R. Co.*, Civil No. 09-123-GPM, 2010 WL 2977142, at *2 (S.D. Ill. July 27, 2010).

Rogers, 352 U.S. at 510). However, despite the FELA’s lower standard of proof, a plaintiff still bears the burden of presenting evidence from which a jury could conclude a “probable” or “likely” causal relationship, as opposed to merely a “possible” one. *Dukes v. Illinois Cent. R.R. Co.*, 934 F. Supp. 939, 944 (N.D. Ill. 1996). *Accord Edmonds v. Illinois Cent. Gulf R.R. Co.*, 910 F.2d 1284, 1288 (5th Cir. 1990) (citing *Moody v. Maine Cent. R.R. Co.*, 823 F.2d 693, 695 (1st Cir. 1987)) (“[T]he plaintiff must show more than a *possibility* that a causal relation existed”) (emphasis in original).

It is beyond dispute that the federal standard for admissibility of expert testimony applies in FELA cases. *See Walker v. Soo Line R.R. Co.*, 208 F.3d 581, 586 (7th Cir. 2000); *Maguire v. Nat’l R.R. Passenger Corp.*, No. 99 C 3240, 2002 WL 472275, at *1 (N.D. Ill. Mar. 28, 2002). Although the United States Court of Appeals for the Seventh Circuit has not addressed the question of the relationship between Rule 702 and *Daubert*, on the one hand, and the reduced burden of proof on causation required under the FELA, a decision of a sister federal court is instructive on this point:

The standard of causation under FELA and the standards for admission of expert testimony under the Federal Rules of Evidence are distinct issues and do not affect one another. It is true that under FELA the quantum of evidence sufficient to present a jury question of causation is less than it is in a common law tort action. This does not mean, however, that FELA plaintiffs need make no showing of causation. Nor does it mean that in FELA cases courts must allow expert testimony that in other contexts would be inadmissible. It means only that in FELA cases the negligence of the defendant need not be the sole cause or whole cause of the plaintiff’s injuries. FELA plaintiffs must still demonstrate some causal connection between a defendant’s negligence and their injuries.

Claar v. Burlington N. R.R. Co., 29 F.3d 499, 503 (9th Cir. 1994) (citations and quotation marks omitted). Additionally, “expert testimony is necessary to establish even that small quantum of

causation required by FELA.” *Id.* at 504. In the specific instance of a claim of alleged toxic exposure under the FELA, “as long as plaintiff’s expert presents scientifically reliable evidence that the toxic exposure could have played some role, however small, in causing plaintiff’s injuries, the testimony should be admitted[.]” *In re Conrail Toxic Tort FELA Litig.*, No. CIV. A 94-11J, CIV A 94-4J, 1998 WL 465897, at *6 (W.D. Pa. Aug. 4, 1998). Nonetheless, the federal standard of admissibility “extends to each step in an expert’s analysis all the way through the step that connects the work of the expert to the particular case. Thus, if the expert’s conclusion – or any inferential link that undergirds it – fails . . . to provide *any* evidence of causation, it must be excluded[.]” *Id.* (citation and quotation marks omitted) (emphasis in original). With the foregoing standard in mind, the Court turns to the matter of the admissibility of Taylor’s expert evidence on causation.

2. Admissibility of Taylor’s Expert Evidence on Causation

UP seeks to exclude the testimony of Taylor’s expert witnesses on the issue of causation; because Taylor has no competent evidence on causation, UP contends further, the railroad is entitled to summary judgment. Accordingly, the Court must evaluate the admissibility under Rule 702 of the testimony of three of Taylor’s expert witnesses, Thomas Osimitz, Thomas Hyers, and Stephen Nagy. The Court turns first to the admissibility of the testimony of Osimitz, a toxicologist retained by Taylor to testify as to the causal link between Taylor’s exposure to sulfuric acid fumes on board UP 9315 and Taylor’s subsequent development of RADS. The admissibility of a toxicologist’s expert testimony is governed by the Federal Judicial Center’s *Reference Manual on Scientific Evidence* (1994), which has been adopted in this Circuit. *See Wintz v. Northrop Corp.*, 110 F.3d 508, 513 (7th Cir. 1997); *Grant v. Chemrex, Inc.*, No. 93 C 0350, 1997 WL 223071,

at **10-11 & n.5 (N.D. Ill. Apr. 28, 1997). In its chapter entitled “Reference Guide on Toxicology,” the *Manual* states,

An opinion on causation should be premised on three preliminary assessments. First, the expert should analyze whether the disease can be related to chemical exposure by a biologically plausible theory. Second, the expert should examine if the plaintiff was exposed to the chemical in a manner that can lead to absorption into the body. Third, the expert should offer an opinion as to whether the dose to which the plaintiff was exposed is sufficient to cause the disease.

Federal Judicial Center, Reference Manual on Scientific Evidence 419. With respect to the first factor, whether Taylor’s RADS can be related to his exposure to sulfuric acid by a biologically plausible theory, the record reflects that in arriving at his opinions, Osimitz reviewed pertinent scientific literature regarding exposure to sulfuric acid, including, inter alia, the Toxicological Profile for Sulfur Trioxide and Sulfuric Acid prepared by the Agency for Toxic Substances and Disease Registry (“ATSDR”), a summary of human and animal studies related to exposure to sulfuric acid, and the American Industrial Hygiene Association’s Emergency Response Planning Guidelines for sulfuric acid, which sets levels of exposure to the chemical that are likely to produce various effects on health. Based on his review of the pertinent literature, Osimitz concluded that exposure to sulfuric acid fumes can have harmful pulmonary effects. In this connection it is worth pointing out that UP’s expert toxicologist Phillip Goad also relied upon the ATSDR report in reaching his opinions, acknowledged the existence of several studies linking exposure to sulfuric acid to respiratory illness together with recommended exposure limits for sulfuric acid promulgated by the American Conference of Governmental Industrial Hygienists and the Occupational Safety and Health Administration (“OSHA”), and conceded that exposure to sulfuric acid was likely to affect different individuals differently.

With respect to whether Taylor was exposed to sulfuric acid in a manner that can lead to absorption of the chemical into Taylor's body and whether the dose to which Taylor was exposed was sufficient to cause RADS, Osimitz recognized that no on-site air monitoring of exposure conditions on board UP 9315 on December 28, 2007, was available and that attempts to recreate the exposure conditions aboard the train through testing doubtless would be subject to considerable challenge by UP. Accordingly, Osimitz studied the data that was available, including the material safety data sheet promulgated by OSHA which addresses the manner in which human beings may absorb sulfuric acid and sulfuric acid vapors into their bodies, the testimony of the members of the crew of UP 9315 on December 28, 2007, including Taylor, regarding exposure conditions, and the medical records of the crew following the exposure incident. On the basis of the foregoing evidence, Osimitz concluded that sulfuric acid fumes of the kind described by witnesses to the exposure incident giving rise to this case can be inhaled, thereby irritating the respiratory tract and impairing lung function. Osimitz further concluded that the level of exposure on board UP 9315 was high enough, as qualified and quantified by Osimitz, to cause Taylor's RADS. While it is the case that Osimitz could have attempted, as Goad did, to recreate the exposure conditions on board UP 9315 on December 28, 2007, through testing, the fact that Osimitz relied upon a different, but scientifically recognized, methodology in reaching his conclusions does not mean that those conclusions are, as UP contends, "junk science." Therefore the Court will deny UP's request to exclude Osimitz's testimony.

The Court turns next to the admissibility of the testimony of Thomas Hyers and Stephen Nagy, who are, as noted, physicians that have treated Taylor. Both Hyers and Nagy opine, based upon a differential diagnosis of Taylor's symptoms, that their patient is suffering from RADS

due to exposure to sulfuric acid fumes. Differential diagnosis, or differential etiology as it sometimes is called as well, is “a standard diagnostic tool used by medical professionals to diagnose the most likely cause or causes of illness, injury and disease.” *Glaser v. Thompson Med. Co.*, 32 F.3d 969, 978 (6th Cir. 1994). See also *Baker v. Dalkon Shield Claimants Trust*, 156 F.3d 248, 252 (1st Cir. 1998) (explaining that differential diagnosis is “a standard scientific technique, widely used in medicine, of identifying a medical ‘cause’ by narrowing the more likely causes until the most likely culprit is isolated”); *McCulloch v. H.B. Fuller Co.*, 61 F.3d 1038, 1044 (2d Cir. 1995) (describing differential diagnosis as an analysis “which requires listing possible causes, then eliminating all causes but one”). A reliable differential diagnosis typically, though not invariably, is performed after “physical examinations, the taking of medical histories, and the review of clinical tests, including laboratory tests,” and generally is accomplished by determining the possible causes for the patient’s symptoms and then eliminating each of these potential causes until reaching one that cannot be ruled out or determining which of those that cannot be excluded is the most likely. *Kannankeril v. Terminix Int’l, Inc.*, 128 F.3d 802, 807 (3d Cir. 1997). However, “[a] doctor does not have to employ all of these techniques in order for the doctor’s diagnosis to be reliable” and “[a] differential diagnosis may be reliable with less than all the types of information set out above.” *Id.* In fact, for a district court to hold that “a differential diagnosis made on less than all types of information cannot be reliable” is an “abuse[] [of] discretion.” *Id.* (citing *In re Paoli R.R. Yard PCB Litig.*, 35 F.3d 717, 759 (3d Cir. 1994)).

Turning then to Hyers, he is a medical doctor whose specialties are occupational medicine and pulmonary diseases. In reaching his conclusions in this case, Hyers performed an independent medical examination of Taylor. In the course of the examination, Hyers took Taylor’s medical

history; additionally, Hyers considered the testimony of the crew of UP 9315 regarding conditions on board the locomotive on December 28, 2007. Finally, Hyers performed spirometry testing that revealed that Taylor's airways are obstructed. Relying upon his knowledge of pulmonary medicine and medical literature pertaining to obstruction of the airways and the relationship between exposure to sulfuric acid and respiratory disorders, Hyers then performed a differential diagnosis of Taylor, considering the various possible causes of Taylor's breathing disorder, the objective spirometry testing, Taylor's medical history, and the temporal relationship between Taylor's exposure to sulfuric acid fumes and the onset of his symptoms. Hyers concluded that as a result of Taylor's exposure to sulfuric acid fumes from the malfunctioning battery on UP 9315, Taylor is suffering from RADS. Notably, Hyers's opinion is consistent with the opinions of six other physicians who have examined Taylor. Equally notably, Hyers's methodology does not differ in its essentials from that employed by Myron Jacobs, UP's medical expert, who reached his conclusions based on his knowledge of pulmonary disorders and an examination of Taylor.

With respect to Nagy, he has been Taylor's treating physician for approximately fifteen years, in which capacity Nagy has treated Taylor for a variety of ailments. In his practice Nagy treats many patients suffering from pulmonary disorders, managing their long-term care in cooperation with specialists in the pulmonary field. In arriving at his opinions, Nagy relied upon the knowledge he has gained by treating Taylor since the latter's exposure to sulfuric acid fumes on December 28, 2007. Additionally, Nagy reviewed medical reports by other physicians who have treated Taylor. Among the data relied upon by Nagy are the results of objective pulmonary function testing of Taylor, which Nagy reviewed and summarized. Also, Nagy reviewed pertinent medical journal articles, including epidemiological studies, regarding sulfuric acid exposure and respiratory

disease. Nagy performed a differential diagnosis of Taylor's symptoms, ruling out such disorders as asthma, chronic obstructive pulmonary disease, pulmonary fibrosis, obstructive sleep apnea, gastroesophageal reflux disease, pulmonary hypertension, allergy, and other pulmonary conditions. Based upon the foregoing, Nagy concluded that Taylor is suffering from RADS caused by his exposure to sulfuric acid fumes on board UP 9315. Again, Nagy's opinion is consistent with those of the majority of physicians who have examined Taylor, and his methodology is no different from that employed by UP's own medical expert.

In general, a failure on the part of a treating physician to rule out all possible causes of an injury goes to the weight, rather than the admissibility, of the opinion. *See Green v. McAllister Bros., Inc.*, No. 02 Civ. 7588(FM), 03 Civ. 1482(FM), 2005 WL 742624, at *13 (S.D.N.Y. Mar. 25, 2005) (quoting *Figueroa v. Boston Scientific Corp.*, 254 F. Supp. 2d 361, 366 (S.D.N.Y. 2003)) (“[T]o the extent that . . . physicians do not fully consider and rule out all possible causes, such deficiencies generally go to the weight of the evidence, not admissibility, and weighing the evidence is a function for the jury.”) (brackets omitted). “A medical expert’s opinion based upon differential diagnosis normally should not be excluded because the expert has failed to rule out every possible alternative cause of a plaintiff’s illness However, a ‘differential diagnosis that fails to take serious account of other potential causes may be so lacking that it cannot provide a reliable basis for an opinion on causation.’” *Cooper v. Smith & Nephew, Inc.*, 259 F.3d 194, 202 (4th Cir. 2001) (quoting *Westberry v. Gislaved Gummi AB*, 178 F.3d 257, 265 (4th Cir. 1999)). “Thus, if an expert utterly fails to consider alternative causes or fails to offer an explanation for why the proffered alternative cause was not the sole cause, a district court is justified in excluding the expert’s testimony.” *Id.* *See also* Fed. R. Evid. 702 advisory committee’s note (in assessing an

expert's reliability, courts should determine whether the expert "has adequately accounted for obvious alternative explanations"); *In re Fosamax Prods. Liab. Litig.*, MDL No. 1789, No. 1:06-cv-7631 (JFK), 2009 WL 4042769, at **7-8 (S.D.N.Y. Nov. 23, 2009) (holding that testimony from a treating physician was inadmissible because, among other omissions, the physician failed to rule out known potential causes of the plaintiff's injuries); *Munaf v. Metropolitan Transp. Auth.*, Nos. 98 CV-4572 (ERK), 00-CV-0134 (ERK), 2003 WL 21799913, at **18-20 (E.D.N.Y. Jan. 22, 2003) (excluding an expert opinion on causation from a treating psychopharmacologist, and holding that "[i]n lieu of any conscientious attempt to rule out [identified] alternative factors, [the proposed expert's] causation determination barely rises above mere speculation and cannot meet the reliability standards of expert testimony under *Daubert*."); *Diaz v. Johnson Matthey, Inc.*, 893 F. Supp. 358, 376 (D.N.J. 1995) (quoting *Paoli*, 35 F.3d at 760) (excluding expert medical testimony on the issue of specific causation where a physician "did little, if anything, to 'rule out alternative causes'" and either "ignore[d]" or offered "no reasonable explanation" for discounting several alternative possible causes for the plaintiff's asthma identified by the defendant).

In this instance, it is not the case that Hyers and Nagy entirely failed to perform differential diagnoses or that their respective differential diagnoses are so inadequate as to render their opinions of no assistance to the trier of fact. Flaws in the diagnoses performed by Hyers and Nagy are an apt subject for exploration on cross-examination. See *McCulloch*, 61 F.3d at 1044 (a physician's opinion on causation was properly admitted as evidence despite "[d]isputes as to . . . his use of differential etiology as a methodology, or lack of textual authority for his opinion"); *Santoro v. Signature Constr., Inc.*, No. 00 Civ. 4595(FM), 2002 WL 31059292, at *4 (S.D.N.Y. Sept. 16, 2002)

(a physician's failure to perform a differential diagnosis and his reliance solely on the plaintiff's description of his symptoms in reaching his conclusions went to the weight of the physician's evidence, not its admissibility, and could be explored on cross-examination); *Marmol v. Biro Mfg. Co.*, No. 93 CV 2659(SJ), 1997 WL 88854, at *6 (E.D.N.Y. Feb. 24, 1997) ("While defendant may ultimately be correct that [an expert's] opinions should not be accorded much weight, it is an entirely different matter from the issue of whether plaintiff should be deprived of the opportunity to present such testimony."). The testimony of Hyers and Nagy is admissible evidence. Because Taylor has competent expert evidence on the issue of causation, UP's request for summary judgment on the basis of Taylor's supposed lack of such evidence will be denied.

3. Taylor's Level of Exposure to Sulfuric Acid

As a final matter, the Court addresses UP's alternate ground for summary judgment, that it is undisputed that the level of sulfuric acid in the air aboard UP 9315 on December 28, 2007, was permissible under OSHA standards and therefore was not in violation of the LIA and the FELA. This point will not detain the Court long, because in fact the level of sulfuric acid to which Taylor was exposed is sharply in dispute, as the Court noted earlier in this case in an order denying a motion by Taylor for summary judgment. To recapitulate some main points from that order, a regulation promulgated by the Federal Railroad Administration ("FRA") entitled "Exhaust and battery gases" provides, in relevant part, that "battery containers shall be vented and batteries kept from gassing excessively." *Taylor*, 2010 WL 2977142, at *2 (quoting 49 C.F.R. § 229.43(b)) (brackets omitted). Further, "the FRA measures excessive gassing of locomotive batteries using the permissible exposure limit ('PEL') developed by [OSHA]. Specifically, the FRA 'employs the OSHA criteria to determine compliance with the [LIA].'" *Id.* (quoting *Locomotive Crashworthiness and Cab*

Working Conditions, Report to Congress from the Federal Railroad Administration, September 1996, Ch. 7)). “Correspondingly, the FRA chooses ‘to deem any measured concentration of a gas that exceeds the OSHA 8-hour time weighted PEL to be a cause for concern, even if that concentration is present for only a short period of time.’” *Id.* (brackets omitted). The relevant OSHA standard for sulfuric acid, the parties agree, is 1 mg/m³. Phillip Goad, a toxicologist retained by UP as an expert witness, opines on the basis of tests that he performed in which he sought to replicate conditions board UP 9315 on December 28, 2007, that the exposure level of sulfuric acid at the time of the incident giving rise to this case did not exceed 1mg/m³. Conversely, both Thomas Osimitz and Stephen Nagy opine that the odor threshold at which people can begin to detect the smell of sulfuric acid is at least 1mg/m³ and can be as high as 3mg/m³ for many people. Osimitz opines based on medical literature concerning the body’s response to sulfuric acid, descriptions of the exposure incident by Taylor and the other men on board UP 9315 on December 28, 2007, and the medical reports of those men after the incident, that the level of exposure on UP 9315 was at least 1mg/m³ and probably was as high as 3mg/m³, that is, three times higher than the OSHA standard. Similarly, Nagy opines that the odor threshold for sulfuric acid is 1mg/m³ for some people and that most people do not detect the odor until 3mg/m³. Nagy infers from the fact that Taylor and the other men aboard UP 9315 could smell sulfuric acid that they were exposed to at least 1mg/m³ of sulfuric acid and probably an even higher level. Obviously, there is a genuine issue of fact for the jury as to whether the level of sulfuric acid in the air on board UP 9315 on December 28, 2007, exceeded the OSHA standard. Accordingly, the Court declines to grant summary judgment for UP on the grounds that the level of sulfuric acid to which Taylor was exposed on board UP 9315 was below the OSHA standard.

III. CONCLUSION

For the foregoing reasons, UP's motion to exclude the evidence of Thomas Osimitz, Thomas Hyers, and Stephen Nagy (Doc. 51) and UP's motion for summary judgment (Doc. 53) are **DENIED**.

IT IS SO ORDERED.

DATED: September 16, 2010

/s/ G. Patrick Murphy
G. PATRICK MURPHY
United States District Judge