

**identifying data deleted to
prevent clearly unwarranted
invasion of personal privacy**

PUBLIC COPY

U.S. Department of Homeland Security
U.S. Citizenship and Immigration Services
Administrative Appeals Office (AAO)
20 Massachusetts Ave., N.W., MS 2090
Washington, DC 20529-2090



U.S. Citizenship
and Immigration
Services

B2

DATE: JUN 02 2011

Office: TEXAS SERVICE CENTER

FILE: [REDACTED]

IN RE:

Petitioner: [REDACTED]

Beneficiary: [REDACTED]

PETITION: Immigrant Petition for Alien Worker as an Alien of Extraordinary Ability Pursuant to Section 203(b)(1)(A) of the Immigration and Nationality Act, 8 U.S.C. § 1153(b)(1)(A)

ON BEHALF OF PETITIONER:

INSTRUCTIONS:

Enclosed please find the decision of the Administrative Appeals Office in your case. All of the documents related to this matter have been returned to the office that originally decided your case. Please be advised that any further inquiry that you might have concerning your case must be made to that office.

If you believe the law was inappropriately applied by us in reaching our decision, or you have additional information that you wish to have considered, you may file a motion to reconsider or a motion to reopen. The specific requirements for filing such a request can be found at 8 C.F.R. § 103.5. All motions must be submitted to the office that originally decided your case by filing a Form I-290B, Notice of Appeal or Motion, with a fee of \$630. Please be aware that 8 C.F.R. § 103.5(a)(1)(i) requires that any motion must be filed within 30 days of the decision that the motion seeks to reconsider or reopen.

Thank you,

Perry Rhew

Perry Rhew

Chief, Administrative Appeals Office

DISCUSSION: The employment-based immigrant visa petition was denied by the Director, Texas Service Center, and is now before the Administrative Appeals Office (AAO) on appeal. The appeal will be dismissed.

The petitioner seeks classification as an “alien of extraordinary ability” in the sciences, pursuant to section 203(b)(1)(A) of the Immigration and Nationality Act (the Act), 8 U.S.C. § 1153(b)(1)(A). The director determined that the petitioner had not established the requisite extraordinary ability through extensive documentation and sustained national or international acclaim.

Congress set a very high benchmark for aliens of extraordinary ability by requiring through the statute that the petitioner demonstrate the alien’s “sustained national or international acclaim” and present “extensive documentation” of the alien’s achievements. *See* section 203(b)(1)(A)(i) of the Act and 8 C.F.R. § 204.5(h)(3). The implementing regulation at 8 C.F.R. § 204.5(h)(3) states that an alien can establish sustained national or international acclaim through evidence of a one-time achievement of a major, internationally recognized award. Absent the receipt of such an award, the regulation outlines ten categories of specific objective evidence. 8 C.F.R. § 204.5(h)(3)(i) through (x). The petitioner must submit qualifying evidence under at least three of the ten regulatory categories of evidence to establish the basic eligibility requirements.

On appeal, counsel argues that the petitioner meets at least three of the ten regulatory categories of evidence at 8 C.F.R. § 204.5(h)(3). For the reasons discussed below, the AAO will uphold the director’s decision.

I. Law

Section 203(b) of the Act states, in pertinent part, that:

(1) Priority workers. -- Visas shall first be made available . . . to qualified immigrants who are aliens described in any of the following subparagraphs (A) through (C):

(A) Aliens with extraordinary ability. -- An alien is described in this subparagraph if --

(i) the alien has extraordinary ability in the sciences, arts, education, business, or athletics which has been demonstrated by sustained national or international acclaim and whose achievements have been recognized in the field through extensive documentation,

(ii) the alien seeks to enter the United States to continue work in the area of extraordinary ability, and

(iii) the alien’s entry into the United States will substantially benefit prospectively the United States.

U.S. Citizenship and Immigration Services (USCIS) and legacy Immigration and Naturalization Service (INS) have consistently recognized that Congress intended to set a very high standard for

individuals seeking immigrant visas as aliens of extraordinary ability. *See* H.R. 723 101st Cong., 2d Sess. 59 (1990); 56 Fed. Reg. 60897, 60898-99 (Nov. 29, 1991). The term "extraordinary ability" refers only to those individuals in that small percentage who have risen to the very top of the field of endeavor. *Id.* and 8 C.F.R. § 204.5(h)(2).

The regulation at 8 C.F.R. § 204.5(h)(3) requires that an alien demonstrate his or her sustained acclaim and the recognition of his or her achievements in the field. Such acclaim and achievements must be established either through evidence of a one-time achievement (that is, a major, international recognized award) or through meeting at least three of the following ten categories of evidence:

- (i) Documentation of the alien's receipt of lesser nationally or internationally recognized prizes or awards for excellence in the field of endeavor;
- (ii) Documentation of the alien's membership in associations in the field for which classification is sought, which require outstanding achievements of their members, as judged by recognized national or international experts in their disciplines or fields;
- (iii) Published material about the alien in professional or major trade publications or other major media, relating to the alien's work in the field for which classification is sought. Such evidence shall include the title, date, and author of the material, and any necessary translation;
- (iv) Evidence of the alien's participation, either individually or on a panel, as a judge of the work of others in the same or an allied field of specialization for which classification is sought;
- (v) Evidence of the alien's original scientific, scholarly, artistic, athletic, or business-related contributions of major significance in the field;
- (vi) Evidence of the alien's authorship of scholarly articles in the field, in professional or major trade publications or other major media;
- (vii) Evidence of the display of the alien's work in the field at artistic exhibitions or showcases;
- (viii) Evidence that the alien has performed in a leading or critical role for organizations or establishments that have a distinguished reputation;
- (ix) Evidence that the alien has commanded a high salary or other significantly high remuneration for services, in relation to others in the field; or
- (x) Evidence of commercial successes in the performing arts, as shown by box office receipts or record, cassette, compact disk, or video sales.

In 2010, the U.S. Court of Appeals for the Ninth Circuit (Ninth Circuit) reviewed the denial of a petition filed under this classification. *Kazarian v. USCIS*, 596 F.3d 1115 (9th Cir. 2010). Although the court upheld the AAO's decision to deny the petition, the court took issue with the AAO's evaluation of evidence submitted to meet a given evidentiary criterion.¹ With respect to the criteria at 8 C.F.R. § 204.5(h)(3)(iv) and (vi), the court concluded that while USCIS may have raised legitimate concerns about the significance of the evidence submitted to meet those two criteria, those concerns should have been raised in a subsequent "final merits determination." *Id.* at 1121-22.

The court stated that the AAO's evaluation rested on an improper understanding of the regulations. Instead of parsing the significance of evidence as part of the initial inquiry, the court stated that "the proper procedure is to count the types of evidence provided (which the AAO did)," and if the petitioner failed to submit sufficient evidence, "the proper conclusion is that the applicant has failed to satisfy the regulatory requirement of three types of evidence (as the AAO concluded)." *Id.* at 1122 (citing to 8 C.F.R. § 204.5(h)(3)). The court also explained the "final merits determination" as the corollary to this procedure:

If a petitioner has submitted the requisite evidence, USCIS determines whether the evidence demonstrates both a "level of expertise indicating that the individual is one of that small percentage who have risen to the very top of the[ir] field of endeavor," 8 C.F.R. § 204.5(h)(2), and "that the alien has sustained national or international acclaim and that his or her achievements have been recognized in the field of expertise." 8 C.F.R. § 204.5(h)(3). Only aliens whose achievements have garnered "sustained national or international acclaim" are eligible for an "extraordinary ability" visa. 8 U.S.C. § 1153(b)(1)(A)(i).

Id. at 1119-20.

Thus, *Kazarian* sets forth a two-part approach where the evidence is first counted and then considered in the context of a final merits determination. In reviewing Service Center decisions, the AAO will apply the test set forth in *Kazarian*. As the AAO maintains *de novo* review, the AAO will conduct a new analysis if the director reached his or her conclusion by using a one-step analysis rather than the two-step analysis dictated by the *Kazarian* court. *See Spencer Enterprises, Inc. v. United States*, 229 F. Supp. 2d 1025, 1043 (E.D. Cal. 2001), *aff'd*, 345 F.3d 683 (9th Cir. 2003); *see also Soltane v. DOJ*, 381 F.3d 143, 145 (3d Cir. 2004) (noting that the AAO conducts appellate review on a *de novo* basis).

¹ Specifically, the court stated that the AAO had unilaterally imposed novel substantive or evidentiary requirements beyond those set forth in the regulations at 8 C.F.R. § 204.5(h)(3)(iv) and 8 C.F.R. § 204.5(h)(3)(vi).

II. Analysis

A. Evidentiary Criteria

This petition, filed on December 31, 2007, seeks to classify the petitioner as an alien with extraordinary ability as a materials engineer. In 1981, the petitioner received his Bachelor of Engineering degree in Metallurgy from [REDACTED] of Baroda in India. At the time of filing, the petitioner was working as a [REDACTED]. In February 2008, the petitioner was promoted to the position of Consulting Materials Engineer. The petitioner has submitted documentation pertaining to the following categories of evidence under 8 C.F.R. § 204.5(h)(3).²

Documentation of the alien's receipt of lesser nationally or internationally recognized prizes or awards for excellence in the field of endeavor.

The petitioner submitted copies of two 2007 [REDACTED] in Engineering for his work [REDACTED] (seven members including the petitioner) and the "Furnace Anti-Coking Technology Improvement Team" (nine members including the petitioner). The petitioner also submitted a July 11, 2007 letter addressed to him from [REDACTED] stating:

I am very pleased to let you know that you have been selected to receive 2007 [REDACTED] in recognition of your efforts on the CVO Furnace Operational Reliability Team and the Furnace Anti-coking Technology Improvement Team. You will be receiving an invitation to an event in honor of all the [REDACTED].

The Operational Excellence Awards highlight accomplishments that exemplify world-class performance in the areas of Safety, Environment, Health, Community, People, Reliability, Quality, Efficiency/Profit, and Safety Observation/Prevented Incident. Operational Excellence in these areas is the key to reaching our goal of being the premier chemical company in the world. Thank you for bringing us closer to this goal and for your commitment to Operational Excellence and to the success of [REDACTED].

The petitioner's evidence also included a document listing [REDACTED] [REDACTED]. It is not clear if this list of awardees is a comprehensive list of the company's [REDACTED], but the submitted list shows more than one hundred recipients of the 2007 award in the area of Engineering alone.

In response to the director's request for evidence, the petitioner submitted evidence of his receipt of an additional [REDACTED] for his work on the

² The petitioner does not claim to meet or submit evidence relating to the categories of evidence not discussed in this decision.

“Olefins Cracking Furnace Erosion Team” (four members including the petitioner). The petitioner received this award from his employer subsequent to the petition’s December 31, 2007 filing date. A petitioner, however, must establish eligibility at the time of filing. 8 C.F.R. §§ 103.2(b)(1), (12); *Matter of Katigbak*, 14 I&N Dec. 45, 49 (Regl. Commr. 1971). Accordingly, the AAO will not consider the petitioner’s 2008 Operational Excellence Award in Engineering in this proceeding.

The petitioner’s response included an August 27, 2009 letter from [REDACTED], Divisional [REDACTED] stating that the Operational Excellence in Engineering Awards “are known nationally and internationally within the extensive employee base of the Company. These awards are the highest level technical recognition within our Company.” The plain language of this regulatory criterion, however, requires evidence of the petitioner’s receipt of “nationally or internationally recognized prizes or awards for excellence *in the field of endeavor*” [emphasis added] rather than limited to a particular company. The submitted documentation indicates that the petitioner’s Operational Excellence in Engineering Awards are internal company honors limited to Lyondell employees rather than nationally or internationally recognized prizes or awards for excellence in the field of endeavor.

On appeal, the petitioner submits material from the September 14-20, 2009 issue [REDACTED] [REDACTED] by sales ranking for 2008. After [REDACTED] merged with [REDACTED] to become [REDACTED] the two companies’ combined sales ranked 4th [REDACTED]. The petitioner also submits marketing material for [REDACTED] which provides general information about the new company. The petitioner, however, did not submit evidence of the national or international *recognition* of the petitioner’s Operational Excellence Awards in Engineering, such as national or widespread local coverage of his awards in professional or general media. The plain language of the regulation at 8 C.F.R. § 204.5(h)(3)(i) specifically requires that the petitioner’s awards be nationally or internationally *recognized* in the field of endeavor and it is his burden to establish every element of this criterion. In this instance, there is no documentary evidence demonstrating that the petitioner’s awards are recognized beyond his employer and therefore commensurate with nationally or internationally recognized prizes or awards for excellence in the field.

In light of the above, the petitioner has not established that he meets this criterion.

Published material about the alien in professional or major trade publications or other major media, relating to the alien's work in the field for which classification is sought. Such evidence shall include the title, date, and author of the material, and any necessary translation.

In general, in order for published material to meet this criterion, it must be primarily about the petitioner and, as stated in the regulations, be printed in professional or major trade publications or other major media. To qualify as major media, the publication should have significant national or

international distribution. Some newspapers, such as the *New York Times*, nominally serve a particular locality but would qualify as major media because of significant national distribution, unlike small local community papers.³

In response to the director's request for evidence, the petitioner submitted an August 2008 article in [REDACTED]

[REDACTED] This article was published subsequent to the petition's December 31, 2007 filing date. As previously discussed, a petitioner must establish eligibility at the time of filing. 8 C.F.R. §§ 103.2(b)(1), (12); *Matter of Katigbak*, 14 I&N Dec. at 49. Accordingly, the AAO will not consider the August 2008 article in this proceeding. Nevertheless, the article [REDACTED] visit to Washington, D.C. to advocate legislation before Congress rather than the petitioner. The regulation at 8 C.F.R. § 204.5(h)(3)(iii) requires that the published material be "about the alien."⁴

In light of the above, the petitioner has not established that he meets this criterion.

Evidence of the alien's original scientific, scholarly, artistic, athletic, or business-related contributions of major significance in the field.

The petitioner submitted several letters of support discussing his work.

[REDACTED] states:

I have known [the petitioner] since he joined [REDACTED] organization in June, 2003.

He developed an *in situ* weld repair procedure for an internally corroded furnace tube at our [REDACTED]

* * *

While considerable industry experience exists to repair metals corroded through the actions of liquids, there is no such experience for the repair of metals or tubes suffering from metal dusting. [The petitioner] accomplished an engineering first, by drawing upon his broad range of experience. He found that small robots had been used in the nuclear power industry because repairs must sometimes be made in radioactive areas where people cannot go. He arranged for a company to provide small robots to weld inside the 6" diameter furnace tubes. . . . He used an experimental alloy, consisting of chromium,

³ Even with nationally-circulated newspapers, consideration must be given to the placement of the article. For example, an article that appears in the *Washington Post*, but in a section that is distributed only in Fairfax County, Virginia, for instance, cannot serve to spread an individual's reputation outside of that county.

⁴ See, e.g., *Accord Negro-Plumpe v. Okin*, 2:07-CV-820-ECR-RJJ at 7 (D. Nev. Sept. 8, 2008) (upholding a finding that articles about a show are not about the actor).

nickel and aluminum. . . . He then applied what was learned in the two tests and repaired all the corroded furnace tubes at [REDACTED]. This was the first time that a repair had been made on corroded, industrial furnace tubes on plant premises. It is a major engineering and scientific accomplishment, with implications for all chemical manufacturers and petroleum refiners. The repair took only one month, which saved Lyondell at least \$36 million because the furnace could start producing again, less than two months after it had been shut down – compared with almost a year if replacement tubes had to be ordered and installed. . . . [The petitioner] presented his data in 2005 at the National Association of Corrosion Engineers, where it was very well received.

[The petitioner] made another original, metallurgical finding of major significance. . . . Radiant tubes are designed to withstand temperatures up to 2100° F., while convection tubes should not be exposed to more than 1050° F. . . . At one point a large number of our furnaces were offline resulting in significant financial impact to the company. We formed a task force to solve the problem, including [the petitioner] since he is an expert in this field. We decided to change the ratio of steam to hydrocarbons in the feedstock (which would lower the temperature in the convection tubes). We improved the quality of the steam, instituted a program to monitor temperatures in the tubes, and made regular inspections of the tubes, replacing all of the convection tubes in the same row if even only one was bad. . . . Prior to [the petitioner's] discovery, no one had understood that lowering the steam / hydrocarbon ratio in feed stocks and cracking heavier liquid feed stock would cause such difficulties. This is an original insight that affects the way any ethylene manufacturer who uses high carbon content inputs can operate. This reliability improvement has potential savings of at least \$33 million.

[The petitioner] has found solutions to difficult technical problems. For example, in our ethylene plants, steam is added to mix liquid feedstock in the convection tubes of furnaces as part of the ethylene manufacturing process. One of our steam pressure vessels [REDACTED] provides steam for 14 furnaces, or one-half of all the ethylene cracking furnaces at the facility. We discovered a 5" inch crack on the outside of the steam pressure vessel. . . . As our leading metallurgical expert in this specific area, [the petitioner] studied the sample and determined the crack was due to caustic environmental cracking and metal fatigue. He concluded the caustic cracking resulted from unnecessary fluctuations in the pH level (base) of the water used to make steam; he also found metal fatigue arose from vibrations within the steam pressure vessel. [REDACTED] devised a large clamp which we welded onto the steam drum to enclose the crack. [The petitioner] selected the method -- acoustic emissions testing -- used by [REDACTED] to determine whether the clamp worked to stabilize the crack.... [The petitioner's] particular contribution to the project lay in two areas of expertise: first, he analyzed a metal core sample of the cracked vessel and determined the cause, and second, he oversaw non-destructive testing of the vessel to determine whether a core sample could be safely taken and afterwards, that the repair had been successful.... The savings to [REDACTED] by this successful repair of an operating steam pressure vessel is about \$76 million, because the ethylene plant did not have to go offline.

* * *

[REDACTED] which drew 600 [REDACTED] [the petitioner] presented the results of his review of equipment failures [REDACTED] and what can be learned from them.

* * *

Here is another example of [the petitioner's] engineering excellence. . . . Once a year, for about 2 months one of our 3 plant boilers is shut down. Over a period of years, the pipes carrying water and steam from the lower to upper chambers were becoming corroded. [The petitioner] studied the issue and discovered that the ash, when combined with moisture in the air during the shutdown period, combined to form sulfuric acid which corroded the pipes. . . . He suggested that immediately upon shutdown, we should wash the ash off the pipes using high pressure water mixed with sodium carbonate (a base) to neutralize the acid. In this way, he prevented further corrosion and saved Lyondell \$10 million by not having to re-tube the boilers.

[REDACTED] regards environmental protection as a top priority. To that end, we entrusted responsibility to [the petitioner] to implement and validate technology designed to prevent underground leaks. . . . [The petitioner] located an advanced technology. Because of the highly competitive nature of the industry, these improvements are kept secret and it is very difficult to learn of them. This technology allows observing up to 10 feet underground [The petitioner] oversaw the verification of the technology's accuracy. We found 31 places which showed apparent leaks or anomalies. Under [the petitioner's] direction, we dug up the earth around 5 of those anomalies and verified that the pipes were indeed leaking. . . . He further proposed a new method to plug leaks. In this method, a small hole is made at the surface; grouting is injected at high pressure. It makes its way to the source of the water leak on the pipe and seals it. . . . By stopping leaks quickly we estimate that every \$1 spent in prevention we will save \$4 in remediation. [The petitioner's] special, major contribution to this effort lay in identifying a virtually unknown technology to find and repair leaks, and in verifying its effectiveness.

The AAO notes that the petitioner was not the original inventor of the underground scanning technology discussed in the latter paragraph. Rather, he sought out the technology from an outside source for use by his employer to prevent underground leakages. [REDACTED] does not provide specific examples of how the petitioner's original work has impacted the field at large. The regulation at 8 C.F.R. § 204.5(h)(3)(v) requires that the contributions be "of major significance in the field" rather than limited to a single employer such as [REDACTED]

[REDACTED] While the petitioner developed a weld repair procedure for corroded furnace tubes at the [REDACTED] identified excessive temperature exposure problems in a convection tube, ensured the successful repair of a steam pressure vessel at [REDACTED]

suggested a new washing method to reduce boiler corrosion during shutdown, and identified an existing scanning technology designed to help prevent underground leakages, there is no evidence showing that his work constitutes original scientific contributions of “major significance” in the field.

states:

From 2003 until 2006 I served as a senior colleague with [the petitioner] on a large team. During that time I saw him on a daily basis and we collaborated on projects, each of us contributing our special expertise. For the last year, I have been his direct supervisor.

* * *

[The petitioner] has analyzed the failures of a variety of heat exchangers. He identified damaging mechanisms and uncovered root causes. For example, in November 2007 we had a transfer line exchanger failure. . . . [The petitioner] began his metallurgical detective work to find the cause. He analyzed the failed pipe, using a metallurgical microscope and a technique that identifies the elements present in the corrosion. He found copper, an element not used in the water of transfer line exchanger. . . . This happened when the water was accidentally intermixed with another chemical liquid. . . . To prevent such problems in the future, [the petitioner] instituted a program of yearly inspections of tubes running through the transfer line exchangers during periods when the furnace is shut down for regular maintenance. (Such a program had not been done.) He also recommended a practice, called chemical cleaning, to remove the copper from the outside of the tubes within the line exchanger.

[The petitioner’s] particular contribution to this problem is in 4 dimensions: first, he found the proximate cause of the failure, copper related corrosion; second, he discovered the root cause, the acidic water carrying copper from a heat exchanger in another linked by a common water system; third, he proposed a method for removing the copper, i.e., chemical cleaning; fourth, he instituted a program of inspections to spot corrosion in the future before it causes equipment failure.

* * *

In 2005 refinery shutdown, he developed and supervised the execution of an automated ultrasonic inspection procedure for confirming the soundness of the welds on a 20” diameter pipe to be used for carrying crude oil. . . . This unique method of testing is not the industry standard or anything approaching it. Most companies don’t know it is possible to do weld inspections this way, so [the petitioner’s] implementation of this method saved at least \$1.5 million and given us a competitive advantage by early startup of the plant.

There is no evidence showing that the petitioner was the original inventor of the automated ultrasonic inspection technology. While the petitioner performed admirably at [REDACTED] by instituting a program of yearly inspections of tubes running through the transfer line exchangers during furnace shut-down periods and by implementing an automated ultrasonic inspection procedure for confirming the soundness of the welds on a 20" diameter pipe to be used for carrying crude oil, there is no evidence showing that his work is indicative of original contributions of "major significance" in the field.

[REDACTED] states:

In July 2003, on [the petitioner's] 10th day on the job, we were performing a routine inspection of a vessel containing hydrogen sulfide, a highly flammable gas which we store under high temperature and pressure. . . . He ordered an automated ultrasound test, which provides much more information than a manual one because it reads from angles and at depth. The automated test appeared to show extensive cracking. . . . He confirmed by microscopic inspection that the shell's integrity had been highly compromised. [The petitioner] recommended that the replacement pressure vessel be made using a special stress reliever procedure which would better resist cracking. This was done.

[The petitioner] made an excellent contribution to this problem in three ways: first, he recommended an effective non-destructive testing method when the standard procedure did not work; second, he accurately interpreted the results of the new data when the stakes were very high, e.g., idling one fourth of the plant's production for months to avoid a serious safety problem; third, he knew about and recommended an important improvement in the manufacturing process to make the vessel more resistant to cracking.

As previously discussed, the plain language of the regulation at 8 C.F.R. § 204.5(h)(3)(v) requires that the petitioner's contributions be "of major significance in the field" rather than primarily limited to a single employer such as [REDACTED]. With regard to the petitioner's occupation, the Department of Labor's Occupational Outlook Handbook (OOH), 2010-11 Edition (accessed at [REDACTED] on May 10, 2011 and incorporated into the record of proceedings), states:

Materials engineers are involved in the development, processing, and testing of the materials used to create a range of products, from computer chips and aircraft wings to golf clubs and snow skis. They work with metals, ceramics, plastics, semiconductors, and composites to create new materials that meet certain mechanical, electrical, and chemical requirements. They also are involved in selecting materials for new applications. Materials engineers have developed the ability to create and then study materials at an atomic level, using advanced processes to replicate the characteristics of those materials and their components with computers. Most materials engineers specialize in a particular material. For example, metallurgical engineers specialize in metals such as steel, and ceramic engineers develop ceramic materials and the processes for making them into useful products such as glassware or fiber-optic communication lines.

(Emphasis added.) See [REDACTED]. According to the regulation at 8 C.F.R. § 204.5(h)(3)(v), an alien's contributions must be not only original but of major significance. The AAO must presume that the phrase "major significance" is not superfluous and, thus, that it has some meaning. If the regulation at 8 C.F.R. § 204.5(h)(3)(v) is to have any meaning, it must be presumed that merely performing routine duties inherent to one's occupation is not necessarily indicative of original engineering contributions of major significance in the field. While the petitioner has helped to ensure safety and improve productivity in his company's plants, there is no evidence showing that his contributions to Lyondell's operations have significantly impacted the field or otherwise equate to original scientific contributions of "major significance" in the field.

[REDACTED]
[REDACTED] states:

I have had the pleasure of working with [the petitioner] on numerous occasions. We have discussed the material requirements for heat resistant alloy furnace components that [REDACTED] has produced for [REDACTED] we have collaborated to determine the cause and preventative actions for components that have prematurely failed in service at [REDACTED] and have associated technically at [REDACTED]

In January, 2005 I became aware of a unique procedure that [the petitioner] had developed to eliminate a catastrophic metal dusting in a Lyondell reformer furnace. As chair of the [REDACTED] on "Metal Dusting and Associated Phenomenon," I was aware of similar problems in other applications and asked [the petitioner] if he would share his procedure with others in our industry. [The petitioner] presented his work to industry corrosion engineers, metallurgists, and scientists at our Corrosion 2005 annual meeting.

* * *

Dissemination of information on metal dusting experiences and innovative methods used to mitigate metal dusting damage is an effective tool to help our technical community combat corrosion-related expenditures.

In developing this unique procedure to eliminate catastrophic metal dusting, [the petitioner] was confronted with a number of problems. The Lyondell metal dusting problem involved internal degradation of reformer furnace tubes at Lyondell's Lake Charles plastic manufacturing plant. To shut the furnace down would impose very significant costs on Lyondell. . . . He developed an original and ingenious solution to the problem. First he found a company which provided small robots, which have been extensively used in the nuclear power industry. . . . He developed a procedure whereby the miniature robot could slowly deposit a weld overlay of a special metal alloy in the inside diameter of the furnace tubes.

One of the greatest problems that [the petitioner] encountered in developing the weld overlay procedure involved producing a high quality protective weld overlay that was free of cracks and porosity. . . . The filler material had never been used in this type of application and initial welding trials indicated that it was prone to cracking. [The petitioner] worked closely with the contractor to develop an acceptable welding process.... A total of four weeks of intensive effort was required to develop the weld procedure and complete the repairs.

[The petitioner's] original engineering accomplishment is of major significance because the repair of corrosion caused by metal dusting is difficult and this represents a new practical way to do it. It was the first time this type of corrosion had been repaired on site in an operating plant. It has immense significance because it allows the corroded tubes to be repaired rather than replaced.

* * *

We collaborated on finding a solution to another difficult problem. Between the radiant furnace tubes which are exposed to direct heat in the furnace and the transfer line exchanger, which cools the gas from the furnace tube, is a component known as the transitional assembly fitting. . . . [The petitioner] analyzed the plant's operations records and observed infrequent disruptions in the cleaning pattern. He determined that, from time to time, instead of steam being injected into the fitting to clean it as normally occurs every 8 hours, cooler condensate entered which stressed the metal and caused thermal fatigue. [The petitioner] and I exchanged ideas and developed ways to make metal more robust. He contributed ideas and I, as a developmental metallurgist, investigated those ideas using software and research sources. Together we created a new alloy to make it more resistant to thermal fatigue. This is an original, innovative, and important modification which has a broad application to all metal fittings outside the furnace where resistance to thermal fatigue is paramount. [redacted] next order of fittings for use outside the furnace will specify the new alloy developed by myself and [the petitioner].

* * *

I read [the petitioner's] paper called [redacted] which was presented at the American Institute of Chemical Engineers in April 2006, one of the premier professional societies in the world in this field. In that paper, he reported on the results of a failure analysis of a special type of convection tube known as a shock bank tube. . . . The special contribution of [the petitioner] to this problem lay in two areas: first, identifying the failure mechanism as from thermal fatigue, and second, determining that excessive amounts of condensate must have been injected during decoking. This second conclusion was resisted by the operations people until he showed them data indicating a dramatic fall in internal tube temperatures, which he laboriously culled from a special box tracking all sorts of plant data.

states that the petitioner has presented his work at industry conferences of the and the American Institute of Chemical Engineers. The petitioner submitted documentation of his presentations at the preceding conferences and other venues where he presented his findings along with numerous other participants. While presentation of the petitioner's work demonstrates that it was shared with others and may be acknowledged as original contributions based on its selection for presentation, the AAO is not persuaded that his presentations are of major significance to the field as a whole and not limited to the engagements in which they were presented. The petitioner failed to establish, for example, that the presentations were of major significance so as to establish their impact or influence beyond the audience at the conferences. Many professional fields regularly hold conferences and symposia to present new work, discuss new findings, and to network with other professionals. These conferences are promoted and sponsored by professional associations, businesses, educational institutions, and government agencies. Participation in such events, however, does not equate to original contributions of major significance in the field. There is no evidence showing that the petitioner's conference presentations have been frequently cited by independent engineering scholars in their work or that his findings have otherwise significantly impacted his field. While the petitioner's presented work is no doubt of value, it can be argued that any industry conference presentation must offer new and useful information to the pool of knowledge. It does not follow that every materials engineer who presents findings that add to the general pool of knowledge has inherently made a contribution of major significance to the field as a whole. In this instance, there is no evidence showing the industrial or commercial implementation of the petitioner's presented work beyond his projects for or that his work otherwise equates to a contribution of major significance in the field.

states:

I have known [the petitioner] over the last 2 years during my work on metal dusting research and on corrosion, in general, pertinent to the petroleum and refining industry. I became acquainted with [the petitioner] at the 2005 NACE International corrosion conference.

* * *

At the Lake Charles plant operated , some furnace tubes became corroded and posed a safety hazard. . . . [The petitioner] developed a way to make repairs of the corroded tubes. He located small robots, which have been used in the nuclear power industry and selected an experimental alloy made of nickel, cadmium, and aluminum for developing a repair procedure.... After two tests, he successfully repaired the old furnace tubes and the furnace was returned to operation. His work is original because for the first time an engineer repaired metal dusting corroded centrifugally cast furnace tube using a procedure that had never been either proposed or accomplished. The work, conducted by [the petitioner], is of major significance because metal dusting corrosion is a common

problem for metals exposed to temperatures of around 1100-1400°F in hydrocarbon (H₂-CO-CO₂) environment with highest rate of metal dusting occurring around 1300-1350°F, as is often the case in industry. Frequently, replacement of tubes would be more costly than their repair, especially when considering the time required to custom-manufacture new tubes.

does not provide specific examples of how the petitioner's method to repair corroded tubes is already being applied by others in the field or otherwise constitutes an original scientific contribution of major significance in the field. To satisfy the criterion relating to original contributions of major significance, the petitioner must demonstrate not only that his work is novel and useful to his employer, but also that it had a demonstrable impact on the field at large. The petitioner has not submitted documentary evidence showing, for instance, how the materials engineering field has significantly changed as a result of his work.

states:

I first met [the petitioner] in 2004 awhile at the NACE International corrosion conference. NACE is a professional society of corrosion engineers. Since then I have met [the petitioner] once or twice a year, always at technical conferences such as API and NACE.

* * *

One of the most novel and important contributions of major significance made by [the petitioner] was the repair of corroded reformer furnace tubes at Lyondell's Lake Charles plant. The furnace tubes had been corroded through a process known as metal dusting, which is an aggressive, hard to prevent, virtually irremediable form of corrosion. In general industrial practice, furnace tubes corroded by metal dusting have not been repaired. They are scrapped. . . . To repair the tubes he found very small robots to fit inside the tubes, which are less than 5.77" in diameter. He chose a new, experimental alloy, and designed a test procedure so that the robot laid the alloy in two separate applications on the inside of the tube. After testing to verify the technique would work, [the petitioner] oversaw the repair of the tubes, a process which took one month.

The repair was successful and his method is of major significance because this type of metal dusting corrosion is so common in industry. There are many instances where the replacement of furnace tubes or other pipes is costly and hence impractical. The ability to repair metals corroded by metal dusting this way can be applied widely in industry.

* * *

In another instance of ingenious work, [the petitioner] investigated the rupture of shock bank convection furnace tubes during a decoking operation. . . . He suggested that only hot steam be used to clear convection tubes of coke, as this would reduce the stress on the

metal substantially. He specially contributed to the problem's solution by determining the cause of the rupture, and proposing a method to prevent the problem in the future. Since adopting [the petitioner's] recommendation, there have been no more failures of shock bank convection tubes at Lyondell during decoking operations.

describes the petitioner's methodology for the repair of corroded reformer furnace tubes at Lyondell's Lake Charles plant, but he does not provide specific examples of how the petitioner's technique is already being applied by others in the industry. While opines that the petitioner's methodology "can be applied widely in industry," there is no documentary evidence of its widespread implementation as of the date of filing. As previously discussed, eligibility must be established at the time of filing. 8 C.F.R. §§ 103.2(b)(1), (12); *Matter of Katigbak*, 14 I&N Dec. at 49. A petition cannot be approved at a future date after the petitioner becomes eligible under a new set of facts. *Matter of Izummi*, 22 I&N Dec. 169, 175 (Comm'r. 1998). That decision further provides, citing *Matter of Bardouille*, 18 I&N Dec. 114 (BIA 1981), that the AAO cannot "consider facts that come into being only subsequent to the filing of a petition." *Id.* at 176.

states:

[The petitioner] was employed as an engineer by affiliate from 8th October 1989 until 9th October 1998. In this capacity he was responsible for the overall Corrosion Engineering and Inspection Engineering function.

* * *

During 1st Gulf War in January 1991, [the petitioner] identified a critical waste heat boiler in hydrogen gas service for the Ammonia Plant process, with the signal from elevated temperature at transition conical head. Hence immediately Plant shutdown [sic] had been taken to evaluate the damage and he developed a procedure to repair the damaged equipment. In addition to the above mentioned duties he made his contribution in the crucial time of war, avoided a potential safety incident.

Manager, JDH, Corrosion Consultants Inc., states:

During the 1st Gulf war U.S. forces had a major operational base in Jubail and carried out air attacks on Iraq from there. During the war all were working at their full capacity.

On February 10th 1991 during daily round [the petitioner] observed a hot spot on the inlet compartment around manhole area. . . . He identified that the failure of bottom tubes towards the manhole side released high pressure boiler feed water, which caused erosion and thermal shocks to refractory. The complete failure of refractory could have resulted into hot spot on inlet compartment. He explained the management that they had

bigger threat of explosion of waste heat boiler in high temperature hydrogen service than from the Iraqi Scud missiles, that further postponing of shutdown would make waste heat boiler beyond repair and they will never be able to consume the full tank of Ammonia... Explosion of waste heat boiler and nearby furnaces and steam drum had the possibility to rupture the Ammonia tank. Puncture of Ammonia tank would cause major casualties and might force evacuation of a complete industrial city. [The petitioner] explained the gravity of the situation and the management decided to immediately shutdown the plant on February 23rd '91. Upon opening of the waste heat boiler they found [the petitioner's] hypothesis to be correct.

* * *

[The petitioner] developed a repair procedure, supervised the repair and assured the quality of the job during the war between Scud missile warning sirens. The boiler was successfully repaired.

While the petitioner admirably performed his duties as an engineer at [REDACTED] the AAO cannot conclude that ensuring the safe operation of equipment in the plant constitutes an original contribution of major significance in the field. The preceding letters from [REDACTED] do not provide specific examples of how the petitioner's engineering methodologies have influenced others in the field or are being implemented in their work.

[REDACTED] states:

[The petitioner] and I collaborated on metallurgical problem. Within [REDACTED] ethylene cracking furnaces are furnace tubes which carry liquid feedstock exposed to very high temperatures of 1800° F. The furnace tubes are joined with fittings. . . . [The petitioner] and I sought to discover if there was a way to extend the life of the fittings. [The petitioner] proposed that, at the time of original manufacture, we use a technique known as hardface welding on the inside of the fitting. He developed the idea for a custom made metal alloy to be used as filler. That filler metal had to be resistant to very high temperature and yet ductile, which means soft enough not to crack. [The petitioner] recommended my patented Norface process, known as tungsten carbide injection, which injects fine tungsten particles into the weld filler metal to create hardness. This treated alloy would be welded to the inside of the fittings to increase the life of the fittings from 2 to at least 4 years for radiant section and 5 to 8+ years for convection section. [The petitioner] selected filler metals which are suitable for base metals and final high temperature ethylene cracking applications. [REDACTED] tested a hardface weld on a fitting, as proposed by [the petitioner]. . . . Due to the novelty of this improvement, [REDACTED] filed a patent application with the U.S. Patent Office on 6/6/2007, listing [the petitioner] as an inventor. [REDACTED] has already ordered and received the new fittings. . . . The title of the invention is [REDACTED] This development is of considerable importance because it can be applied to a wide range

of uses in hydrocarbon cracking i.e. in ethylene cracking wherever metals are exposed to great heat, and where under those conditions the metal must retain hardness. [REDACTED] is continuously ordering hardface fittings from Northmonte.

Several sentences in the preceding paragraph in [REDACTED] letter are identical to those appearing in a paragraph on pages 3 and 4 of the aforementioned letter from [REDACTED]. It is not clear who is the actual author of the duplicative text in their letters of support, but it is highly improbable that these two individuals independently formulated the exact same wording. While it is acknowledged that [REDACTED] have both lent their support to this petition, it appears that at least one of them did not independently prepare the preceding section of his letter. Accordingly, the AAO finds their duplicative statements to be of limited probative value.

[REDACTED] states:

One of [the petitioner's] most important findings is employed by [REDACTED] to prevent erosion in convection furnace tubes. His recommendations were implemented throughout the company and resulted in operational changes at three of our largest manufacturing sites. [The petitioner's] ideas were incorporated in a patent application filed with the U.S. Patent and Trademark Office, under the name [REDACTED].

The petitioner submitted a June 7, 2007 letter from [REDACTED] confirming that the company filed a patent application with the United States Patent and Trademark Office for the petitioner's invention entitled "[REDACTED]." The AAO notes that the letters from [REDACTED], and [REDACTED] do not indicate that [REDACTED] has licensed or marketed the petitioner's innovation to others in the industry. Thus, the impact of his invention in the field is not documented in the record. As previously discussed, the plain language of the regulation at 8 C.F.R. § 204.5(h)(3)(v) requires that an alien's contributions must be not only original but "of major significance in the field." Even if the petitioner were to establish that his patent application had been approved as of the petition's filing date, which he has not, the grant of a patent demonstrates only that an invention is original. With respect to a lesser classification under section 203(b)(2) of the Act, this office has previously stated that a patent is not necessarily evidence of a track record of success with some degree of influence over the field as a whole. *See Matter of New York State Dep't. of Transp.*, 22 I&N Dec. 215, 221 n. 7, (Comm'r. 1998). Rather, the significance of the innovation must be determined on a case-by-case basis. *Id.* In this instance, there is no documentary evidence showing [REDACTED] widespread industrial or commercial implementation of the petitioner's invention at the time of filing or that it otherwise constitutes a contribution of major significance in the field.

[REDACTED] states:

Because of the professional engineering needs for [the petitioner's] employer, the [REDACTED] we have been working together since June 30, 2003 to develop and bring technically adept and cost effective non-invasive solutions to the problem of deteriorating pipelines that carry water and such hazardous materials as oil, gas, and sewage waste products throughout [REDACTED] and their associate's plants both within the U.S.A. and in the four (4) continents in which they have facilities.

[The petitioner] was placed in charge of [REDACTED] underground leak detection program, with instructions to identify, develop, and test better strategies for detecting leaks and fixing them when found. He received a budget of \$2 million from [REDACTED] and contacted our firm. We performed an infrared thermal imaging service (including data analysis with our proprietary software) to look for leaks in underground pipes. We reported a certain number of 'anomalies.' [The petitioner] had the ground in the area of the anomalies excavated and reported the results to us. This feedback proved enormously helpful to us in refining and improving our data analysis. [The petitioner's] particular contribution to the project was his willingness to utilize a new, unfamiliar method for finding, improving, and ultimately repairing underground leaks. It required first, a knowledge of leak detection resources that are not generally known, second, making the effort to give us detailed feedback on the results of the excavation, and third, the willingness to expend significant money to test the effectiveness of the program.

The petitioner's knowledge of leak detection resources and utilization of an advanced technology for leak repair constitute, essentially, occupational knowledge and experience which can be articulated on an application for an alien employment certification. The issue of whether similarly-trained workers are available in the United States is an issue under the jurisdiction of the Department of Labor. *See Matter of New York State Dep't. of Transp.*, 22 I&N Dec. 215, 221 (Commr. 1998). In the present matter, the petitioner has not established that his skills and expertise have already resulted in original contributions of major significance in the field. While the petitioner coordinated an underground leakage prevention and repair program for [REDACTED] there is no evidence showing that his work qualifies as original engineering contributions of "major significance" in the field. As previously discussed, the plain language of the regulation at 8 C.F.R. § 204.5(h)(3)(v) requires that the contributions be "of major significance in the field" rather than limited to a single employer.

The opinions of experts in the field are not without weight and have been considered above. USCIS may, in its discretion, use as advisory opinions statements submitted as expert testimony. *See Matter of Caron International*, 19 I&N Dec. 791, 795 (Comm'r. 1988). However, USCIS is ultimately responsible for making the final determination regarding an alien's eligibility for the benefit sought. *Id.* The submission of letters from experts supporting the petition is not presumptive evidence of eligibility; USCIS may evaluate the content of those letters as to whether they support the alien's eligibility. *See id.* at 795-796; *see also Matter of V-K-*, 24 I&N Dec. 500, n.2 (BIA 2008) (noting that expert opinion testimony does not purport to be evidence as to "fact"). Thus, the content of the experts' statements and how they became aware of the petitioner's reputation are important considerations. Even when written by independent experts,

letters solicited by an alien in support of an immigration petition are of less weight than preexisting, independent evidence that one would expect of a materials engineer who has made original contributions of major significance. Without documentary evidence showing that the petitioner's work equates to original contributions of major significance in his field, the AAO cannot conclude that he meets this criterion.

Evidence of the alien's authorship of scholarly articles in the field, in professional or major trade publications or other major media.

The petitioner did not initially submit evidence for this regulatory criterion. In response to the director's request for evidence, the petitioner submitted documentary evidence of three technical presentations made by him at the Annual Ethylene Producers' Conference in April 2006, April 2008, and April 2009. On appeal, the petitioner submits material from the American Institute of Chemical Engineers website indicating that abstracts (not exceeding 1500 words) for the Annual Ethylene Producers' Conference are reviewed by session chairs who make "the decision to accept or reject" submissions to the conference. The material further states: "Only papers of poor/lacking quality should be rejected."

post-date the petition's December 31, 2007 filing date. As previously discussed, a petitioner must establish eligibility at the time of filing. 8 C.F.R. §§ 103.2(b)(1), (12); *Matter of Katigbak*, 14 I&N Dec. at 49. Accordingly, the AAO will not consider the latter two presentations from April 2008 and April 2009 in this proceeding. Nevertheless, the plain language of the regulation at 8 C.F.R. § 204.5(h)(3)(vi) requires "[e]vidence of the alien's authorship of *scholarly articles* in the field, in professional or major trade publications or other major media." [Emphasis added.] Generally, scholarly articles are written by and for experts in a particular field of study, are peer-reviewed, and contain references to sources used in the articles. In this case, the technical presentations submitted by the petitioner do not equate to "scholarly articles" and contain no references to any sources. Further, while the petitioner's technical presentations were made available online, there is no evidence showing that they were in professional or major trade publications or other major media. Moreover, even if the AAO were to conclude that the petitioner's April 2006 technical presentation pre-dating the filing of the petition meets the elements of this criterion, which the AAO does not, the plain language of the regulation at 8 C.F.R. § 204.5(h)(3)(vi) requires evidence of "authorship of scholarly articles" in the plural. The use of the plural is consistent with the statutory requirement for extensive evidence. Section 203(b)(1)(A)(i) of the Act. Significantly, not all of the criteria at 8 C.F.R. § 204.5(h)(3) are worded in the plural. Specifically, the regulations at 8 C.F.R. §§ 204.5(h)(3)(iv) and (ix) only require service on a single judging panel or a single high salary. When a regulatory criterion wishes to include the singular within the plural, it expressly does so as when it states at 8 C.F.R. § 204.5(k)(3)(ii)(B) that evidence of experience must be in the form of "letter(s)." Thus, the AAO can infer that the plural in the remaining regulatory criteria has meaning. In a different context, federal courts have upheld USCIS' ability to interpret significance from whether the singular or plural is used in a regulation.⁵

⁵ See *Maramjaya v. USCIS*, Civ. Act. No. 06-2158 (RCL) at 12 (D.C. Cir. March 26, 2008); *Snapnames.com Inc. v. Chertoff*, 2006 WL 3491005 at *10 (D. Or. Nov. 30, 2006) (upholding an interpretation that the regulatory

In light of the above, the petitioner has not established that he meets this criterion.

Evidence that the alien has performed in a leading or critical role for organizations or establishments that have a distinguished reputation.

As previously discussed, the petitioner submitted letters of support indicating that he worked as an engineer at the [REDACTED] complex, but there is no evidence showing that his employer had a distinguished reputation or that his role was leading or critical in relation to that of his coworkers. On appeal, counsel argues that the petitioner is performing in a leading or critical role for [REDACTED]. Counsel does not address the petitioner's role for any other distinguished organizations or establishments.

The December 10, 2007 letter of support from [REDACTED] submitted at the time of filing states:

[The petitioner] plays a leading role in [REDACTED] he is the highest ranking materials engineering expert for all 8 olefins plants in the United States. He is [REDACTED] materials engineering expert at all 24 [REDACTED] throughout the world for all complex high-end materials problems involving non-destructive testing, repair of pressure vessels, boilers, refinery equipment, and underground piping leaks. [REDACTED] tracks its engineers in two categories: management and technical. [The petitioner] falls in the technical group. He provides mentoring, coaching and technical support to more than 20 plant engineers, all of whom have at least Bachelor's degrees in engineering and up to 15 years experience. [The petitioner] also provides similar service and mentoring to the Inspection Supervisor and inspection personnel.

Subsequently, the petitioner submitted a May 27, 2008 letter from [REDACTED] stating that the petitioner was "promoted to a position of [REDACTED] in February 2008." In response to the director's request for evidence, the petitioner submitted an August 27, 2009 letter from [REDACTED] discussing the petitioner's new role as a [REDACTED] [REDACTED] states:

[The petitioner] stands in one of the highest technical positions within the company. Amongst engineers, there are two tracks: technical and managerial. Within the technical track, the highest position is "Advisors," of which there are approximately 12 in all engineering disciplines (mechanical, chemical, electrical, controls, materials) out of 15,000 employees. The next highest technical level is "Consulting Engineers," of which there are approximately 60 company-wide.

requirement for "a" bachelor's degree or "a" foreign equivalent degree at 8 C.F.R. § 204.5(l)(2) requires a single degree rather than a combination of academic credentials).

[The petitioner] holds the position of Consulting Engineer and specializes in Materials Engineering. Within this discipline, there are only three engineers in the top two engineering levels. Thus among Materials Engineers, [the petitioner] is among the top three ranking engineers in the entire company. [The petitioner's] judgment is relied upon for major company decisions in the field of materials engineering. He often must address whether projects can be done. He also regularly must address questions of fitness for service and safety, including how much useful service life remains in key operational equipment such as tubes, pipes, pressure vessels, furnaces. These are matters entrusted to [the petitioner] which involve the safety and profitability of our global operations.

The petitioner's promotion from Principal Materials Engineer to Consulting Materials Engineer in February 2008 post-dates the filing of the petition. As previously discussed, a petitioner must establish eligibility at the time of filing. 8 C.F.R. §§ 103.2(b)(1), (12); *Matter of Katigbak*, 14 I&N Dec. at 49. Accordingly, the AAO will not consider the petitioner's role as a Consulting Materials Engineer in this proceeding.

According to an organizational chart submitted by the petitioner and the letter of support from [redacted] the petitioner's position of Principal Engineer at Lyondell was subordinate to the following positions:

- Chief Operating Officer
- Senior Vice President of Manufacturing and Engineering
- Divisional Vice President of Engineering
- Manager of Mechanical/Materials Engineering
- Senior Advisors (12)
- Consulting Engineers (60)

While the petitioner has performed admirably on the projects to which he was assigned, there is no evidence showing that his role of Principal Materials Engineer was leading or critical when compared to the 76 higher-level company positions identified above. The petitioner's evidence does not demonstrate how his role at the time of filing differentiated him from his company's other Principal Engineers, let alone [redacted]

[redacted] The documentation submitted by the petitioner does not establish that he was responsible for [redacted] success or standing to a degree consistent with the meaning of "leading or critical role." Further, as previously discussed, section 203(b)(1)(A)(i) of the Act requires the submission of extensive evidence. Consistent with that statutory requirement, the regulation at 8 C.F.R. § 204.5(h)(3)(viii) requires the submission of evidence that the alien has performed in a leading or critical role for "organizations or establishments" in the plural. Therefore, even if the petitioner were to establish that his role as a [redacted] was leading or critical, which he has not, documenting a leading or critical role for only one distinguished organization does not meet the plain language of the regulation.

In light of the above, the petitioner has not established that he meets this criterion.

Evidence that the alien has commanded a high salary or other significantly high remuneration for services, in relation to others in the field.

The petitioner submitted documentation indicating that he has received a high salary in relation to others in the field as of the petition's filing date. Accordingly, the AAO concurs with the director's finding that the petitioner's evidence meets this regulatory criterion.

Summary

In this case, the AAO affirms the director's determination that the petitioner has failed to demonstrate his receipt of a major, internationally recognized award, or that he meets at least three of the ten categories of evidence that must be satisfied to establish the minimum eligibility requirements necessary to qualify as an alien of extraordinary ability. 8 C.F.R. § 204.5(h)(3). A final merits determination that considers all of the evidence follows.

B. Final Merits Determination

In accordance with the *Kazarian* opinion, the AAO will next conduct a final merits determination that considers all of the evidence in the context of whether or not the petitioner has demonstrated: (1) a "level of expertise indicating that the individual is one of that small percentage who have risen to the very top of the[ir] field of endeavor," 8 C.F.R. § 204.5(h)(2); and (2) "that the alien has sustained national or international acclaim and that his or her achievements have been recognized in the field of expertise." Section 203(b)(1)(A) of the Act; 8 C.F.R. § 204.5(h)(3). *See also Kazarian*, 596 F.3d at 1119-20. In the present matter, many of the deficiencies in the documentation submitted by the petitioner have already been addressed in the AAO's preceding discussion of the regulatory criteria at 8 C.F.R. §§ 204.5(h)(3)(i), (iii), (v), (vi), (viii), and (ix).

With regard to the evidence submitted for 8 C.F.R. § 204.5(h)(3)(i), the AAO notes that competition for the petitioner's [redacted] Awards was limited to [redacted] employees. Moreover, the documentation submitted by the petitioner indicates that more than one hundred of the petitioner's coworkers received the 2007 award in the area of Engineering alone. Thus, the preceding awards do not establish that the petitioner is among "that small percentage who have risen to the very top of the field of endeavor." 8 C.F.R. § 204.5(h)(2). USCIS has long held that even athletes performing at the major league level do not automatically meet the "extraordinary ability" standard. *Matter of Price*, 20 I&N Dec. 953, 954 (Assoc. Commr. 1994); 56 Fed. Reg. at 60899.⁶ Likewise, it does not

⁶ While the AAO acknowledges that a district court's decision is not binding precedent, we note that in *Matter of Racine*, 1995 WL 153319 at *4 (N.D. Ill. Feb. 16, 1995), the court stated:

[T]he plain reading of the statute suggests that the appropriate field of comparison is not a comparison of [redacted] ability with that of all the hockey players at all levels of play; but rather, [redacted] ability as a

follow that an award limited to employees of a single company should necessarily qualify a materials engineer for an extraordinary ability employment-based immigrant visa. To find otherwise would contravene the regulatory requirement at 8 C.F.R. § 204.5(h)(2) that this visa category be reserved for “that small percentage of individuals that have risen to the very top of their field of endeavor.”

Regarding the documentation submitted for 8 C.F.R. § 204.5(h)(iii), the August 2008 article in *Materials Performance* entitled “NACE Members Emphasize Corrosion Issues on Legislative Day” was published subsequent to the petitioner’s filing date and is not about the petitioner. Moreover, this single published article containing a group photograph identifying the petitioner is not indicative of sustained national or international acclaim at the very top of the field of endeavor.

With regard to the petitioner’s original engineering work submitted for 8 C.F.R. § 204.5(h)(3)(v), as stated above, it does not appear to rise to the level of contributions of “major significance in the field.” Demonstrating that the petitioner’s work was “original” in that it did not merely duplicate prior work is not useful in setting the petitioner apart through a “career of acclaimed work.” H.R. Rep. No. 101-723, 59 (Sept. 19, 1990). That page (59) also says that “an alien must (1) demonstrate sustained national or international acclaim in the sciences, arts, education, business or athletics (as shown through extensive documentation)...” To argue that all original engineering work is, by definition, “extraordinary” is to weaken that adjective beyond any useful meaning, and to presume that most research is “unoriginal.”

Regarding the evidence submitted for 8 C.F.R. § 204.5(h)(3)(vi), the AAO acknowledges that the petitioner has made presentations at professional engineering conferences. Aside from the multiple deficiencies previously identified, there is no evidence showing that the petitioner’s presented work has attracted a level of interest in his field commensurate with sustained national or international acclaim at the very top of the field. For instance, the information about the Annual Ethylene Producers’ Conference submitted by the petitioner from the American Institute of Chemical Engineers website states: “Only papers of poor/lacking quality should be rejected.” Thus, having one’s work selected for presentation at this conference is not necessarily indicative of sustained national or international acclaim at the very top of the field. The AAO notes that the citation history of the petitioner’s body of published and presented work is a relevant consideration as to whether the evidence is indicative of his recognition beyond his own circle of collaborators. *See Kazarian*, 596 F. 3d at 1122. In the present matter, there is no evidence showing that the petitioner’s conference presentations have been frequently cited by independent

professional hockey player within the NHL. This interpretation is consistent with at least one other court in this district, *Grimson v. INS*, No. 93 C 3354, (N.D. Ill. September 9, 1993), and the definition of the term 8 C.F.R. § 204.5(h)(2), and the discussion set forth in the preamble at 56 Fed. Reg. 60898-99.

Although the present case arose within the jurisdiction of another federal judicial district and circuit, the court’s reasoning indicates that USCIS’ interpretation of the regulation at 8 C.F.R. § 204.5(h)(3)(ix) is reasonable.

engineering scholars in their work or that his findings have otherwise significantly impacted his field.

Regarding the documentation submitted for 8 C.F.R. § 204.5(h)(3)(viii), the petitioner's evidence does not demonstrate how his role at the time of filing differentiated him from his company's other [REDACTED]

[REDACTED] The documentation submitted by the petitioner does not establish that he was responsible for Lyondell Chemical Company's success or standing to a degree consistent with the meaning of "leading or critical role" and indicative of sustained national or international acclaim at the very top of the field.

Ultimately, the evidence in the aggregate does not distinguish the petitioner as one of the small percentage who has risen to the very top of the field of endeavor. The petitioner relies on internal recognition by his immediate employer, a single article published subsequent to the petition's filing date which contains a group photograph identifying the petitioner, several letters of support discussing the petitioner's activities for [REDACTED] and the [REDACTED] [REDACTED] a patent application whose impact in the field is undocumented, conference presentations resulting from his engineering work, evidence that he earns a high salary in his field, and the praise of his colleagues and superiors.

The AAO notes that many of the petitioner's references' credentials are far more impressive. For example, [REDACTED] received his received his M.S. and Ph.D. in Metallurgy and Materials Science from Carnegie Mellon University. [REDACTED]

I presently hold the position of Distinguished Fellow and Manager for the Section on Corrosion and Mechanics of Materials in the Nuclear Engineering Division at Argonne National Laboratory. . . . I have conducted research in the areas of metallurgy, materials science, and materials engineering in support of several advanced energy technologies such as chemical process industry, sodium-cooled fast nuclear reactors, light-water nuclear reactors, tokamak fusion systems, and fossil energy systems such as coal gasification and coal combustion. I am a Fellow of professional societies such as ASM international and National Association of Corrosion Engineers. I have published over 400 publications and have been awarded several patents. I am also in the technical boards of several journals and a consultant to several branches of the U.S. Department of Energy.

[REDACTED] states:

I am registered professional metallurgical engineer. I have BS, MS and Ph.D. in metallurgical engineering. Presently I am working as [REDACTED] [REDACTED] . . . I am an active member of American Petroleum Institute (API), National Association of Corrosion Engineers (NACE) and American Welding Society (AWS). I have published more than 20 papers

in technical publications, and have also made several presentations in many national and international conferences on related subjects. Presently I am the chairperson responsible to develop five API specifications for fabrication and inspection heavy wall reactors made of various metals.

I am the [REDACTED] . . . I am a Certified Reliability and Maintenance Professional and have published several papers on the implementation of reliability programs for the refining and petrochemical industry. I have spoken on these topics domestically and internationally. During my career I have implemented reliability and maintenance programs for refineries, petrochemical and synthetic fuels plants. In the 80's I was responsible for the reliability and project area for the start up and operation of the world's first commercial oil shale venture.

In my current role, I direct an organization of approximately 50 engineering professionals that provide high level mechanical engineering support and maintenance expertise to all of Lyondell's manufacturing facilities on a world wide basis. This group sets the strategic direction and budget for maintenance at all sites, develops and implements reliability initiatives, develops and implements engineering standards defining the construction and maintenance of our plants and provides high level troubleshooting and problem solving.

I am the Manager of the [REDACTED] . . . I am a licensed Professional Engineer and have a degree in Mechanical Engineering with 20 years of experience in the petrochemical and refining industry. While I have a breadth of experience in these industries my specialization is in the area of unfired process heat transfer equipment. In this area I hold a patent for an on-line fouling control system . . . and am the taskforce chairman for the American Petroleum Institute's (API's) industry standard for shell and tube heat exchangers (API660) which is adopted internationally as ISO standard [REDACTED]. In my current role, I manage a group of 20 engineering professionals that provide high level mechanical engineering support and maintenance expertise to all of [REDACTED] manufacturing facilities on a world wide basis in the area of stationary equipment.

Gerald Gapinski states:

I am a senior metallurgical engineer in the corporate Research and Development department at Metaltek International where I have responsibility for development of new alloys, new manufacturing processes, and improvement of existing alloys and processes. As a corporate metallurgical engineer, I provide technical support for our metal casting facilities in Pevely, MO; Chattanooga, TN; Watertown, WI and Waukesha, WI. I also

conduct metallurgical analyses of plant and customer supplied samples, publish technical papers and provide technical support for our sales department.

Professionally, I am active in NACE International and ASTM. I currently chair the NACE Specific Technology Group 37 for High Temperature Materials in the Process Industry committee and the NACE Technology Exchange Group TEG 128X committee for Metal Dusting and Associated Phenomena. My ASTM activities include past secretary of A01.18 for Iron and Steel Castings, membership in ASTM A01, A01.10, and A01.18 committees and have sponsorship responsibility for A297, A426, A451, A608, A660, and A872 specifications. I have authored technical papers for presentation at The Metallurgical Society (TMS), The American Institute of Chemical Engineers (AIChE), NACE International, The Steel Founders' Society of America (SFSA), and the Calgary chapter of the Canadian Welding Society and have made technical presentations in the United States, Canada, Venezuela, Indonesia, and China.

I am President of joint venture of Valv Technology and Northmonte. I am a Metallurgical Engineer with 35+ years of progressive work experience in the field of weld hard facing with Baker Oil Tools, Alloy Carbides / Cerametics. For last 8 years I have my own business of providing weld hard facing services to Oil & Gas and petrochemical industries. I hold three U.S. patents . . . in my area of expertise i.e. hard facing. For many years I was honorary Professor of Metallurgical Engineering at Rice University in Houston.

While the petitioner need not demonstrate that there is no one more accomplished than himself to qualify for the classification sought, it appears that the very top of his field of endeavor is far above the level he has attained. In this case, the petitioner has not established that his achievements at the time of filing were commensurate with sustained national or international acclaim as a materials engineer, or being among that small percentage at the very top of the field of endeavor.

III. Conclusion

Review of the record does not establish that the petitioner has distinguished himself to such an extent that he may be said to have achieved sustained national or international acclaim and to be within the small percentage at the very top of his field. The evidence is not persuasive that the petitioner's achievements set him significantly above almost all others in his field at a national or international level. Therefore, the petitioner has not established eligibility pursuant to section 203(b)(1)(A) of the Act and the petition may not be approved.

An application or petition that fails to comply with the technical requirements of the law may be denied by the AAO even if the Service Center does not identify all of the grounds for denial in the initial decision. *See Spencer Enterprises, Inc. v. United States*, 229 F. Supp. 2d at 1043,

aff'd, 345 F.3d at 683; *see also Soltane v. DOJ*, 381 F.3d at 145 (noting that the AAO conducts appellate review on a *de novo* basis).

The petition will be denied for the above stated reasons, with each considered as an independent and alternative basis for denial. In visa petition proceedings, the burden of proving eligibility for the benefit sought remains entirely with the petitioner. Section 291 of the Act, 8 U.S.C. § 1361. Here, that burden has not been met.

ORDER: The appeal is dismissed.