SERVIÇO PÚBLICO FEDERAL
CONSELHO FEDERAL DE ENGENHARIA E AGRONOMIA – CONFEA

RELATÓRIO TÉCNICO INFORMATIVO

1 – Dados Profissionais:

Nome e Título Profissional:

Eng. Civ. André Luiz Schuring – Conselheiro Federal

Eng. Civ. Ricardo Augusto Mello de Araújo – Conselheiro Federal

Eng. Civ. Luis Edmundo Prado Campos – Representante do Colégio de Presidentes

Eng. Civ. Jorge Luiz Muniz de Mattos – Representante da Coordenadoria de Câmaras Especializadas de Engenharia Civil

Eng. Agr. Flávio Bolzan – Assessor do Confea

2 – Dados dos objetivos da viagem:

Finalidade da viagem:

Participação na Convenção da *American Society of Civil Engineers – ASCE 2018*,

Local:

Denver – Colorado – Estados Unidos da América

Entidade promotora do evento:

American Society of Civil Engineers - ASCE

Período:

12 a 15 de outubro de 2018

Definição dos objetivos a serem alcançados, indicando como e onde serão aplicados os conhecimentos adquiridos:

A participação de representantes do Sistema Confea/Crea em congressos internacionais alinha-se ao incremento das expectativas dos profissionais e empresas brasileiras no que se refere a um maior nível de inserção internacional do Sistema Confea/Crea, conforme se depreende das discussões e propostas havidas ao longo das duas últimas edições do Congresso Nacional de Profissionais – CNP:

7º Congresso Nacional de Profissionais (agosto de 2010):	
PNS 54	*Motivar e viabilizar a participação de profissionais que apresentarem trabalhos técnicos, assuntos de interesses da categoria, ideias e produtos inovadores em eventos internacionais da área da Engenharia, Arquitetura, Agronomia e Geociência.*
PNS 55	*Formular propostas de política de relacionamento institucional com as Organizações Profissionais Congêneres, Embaixadas, Ministério das Relações Exteriores, Organizações Internacionais e Instituições diversas de interesse dos profissionais e empresas da área tecnológica, buscando desenvolver propostas de parceria e cooperação.*
8º Congresso Nacional de Profissionais (setembro de 2013):	
PNS 57	*Propor que o Sistema Confea/Crea viabilize a sua participação rotineira em eventos internacionais relacionados às profissões abrangidas, permitindo e buscando a aproximação com INSTITUIÇÕES DE ENSINO E PESQUISA de renome no intuito de fomentar o aprimoramento tecnológico nas áreas de ATUAÇÃO PROFISSIONAL, visando a resultados práticos e palpáveis para os profissionais e para a sociedade brasileira, por meio da abertura de possibilidades de intercâmbio profissional.*
PNS 58	*Criar um programa de inserção internacional dos profissionais de engenharia e agronomia que estão no exterior quando retornarem ao mercado brasileiro (O programa de retorno dos profissionais e a atualização dos mesmos podem ser desenvolvidos pelo Sistema Confea/Crea, por meio das entidades de classe, oferecendo cursos de atualização e especialização com recursos oriundos do Banco Nacional de Desenvolvimento Econômico e Social – BNDES,, dos ministérios e de empresas*
PNS 59	*Propor que o Sistema Confea/Crea restrinja a entrada de profissionais estrangeiros, na medida em que passe a considerar a reciprocidade ao tratamento dispensado aos profissionais brasileiros no exterior, regulamentando o registro profissional distintamente para cada país de origem, negociando e discutindo individualmente com cada nação e organizações congêneres nos diversos países que mantém relação com Brasil, disseminando a legislação profissional estrangeira aos nacionais interessados bem como atuando principalmente no âmbito do Mercosul, com o estabelecimentos das negociações da CIAM.*
PNS 60	*Propor a inserção internacional via aprimoramento dos profissionais do Sistema Confea/Crea, em tecnologia e inovação, em países estrangeiros desenvolvidos e/ou em desenvolvimento (a inserção internacional se daria a exemplo do programa ciência sem fronteiras – programa do governo brasileiro – via imersão tecnológica)*
PNS 61	*Propor a inserção internacional dos profissionais do Sistema Confea/Crea para realização de intercâmbio técnico internacional, a partir da alteração da Lei nº 6.494/77*
9º Congresso Nacional de Profissionais (1ª Etapa):	
PNS	*Celebração de convênios entre o Confea e órgãos competentes, visando*

80	*conferir a regularização do registro do profissional estrangeiro e diplomado no exterior no Crea da jurisdição onde pretende exercer sua profissão, bem como promover a inserção internacional via aprimoramento dos profissionais do Sistema Confea/Crea em tecnologia e inovação em países estrangeiros.*

As ações e estratégias de atuação internacional, por sua natureza e pelas diversidades entre as nações devem ser pautadas no diálogo e na reciprocidade, parâmetros esses indissociáveis da atuação do Sistema Confea/Crea no âmbito internacional.

A eventual não participação do Sistema Confea/Crea nos fóruns mundiais de discussão do exercício e das atividades das engenharias e agronomia ensejaria o alijamento da engenharia e agronomia brasileiras nas negociações internacionais, certamente refletindo em aspectos econômicos e de soberania nacionais.

A título de ilustração, transcrevemos trecho da publicação Sistema Confea/Crea: 75 anos construindo uma nação (2008), relativo à "internacionalização do Sistema Confea/Crea":

> *É um processo que vem de gestões anteriores, de mostrar para o Brasil e para nossas categorias que se tem um mercado enorme lá fora buscando empresas e profissionais competentes, o que, aliás, historicamente já vem ocorrendo. Europeus e americanos buscam nossas melhores cabeças nos cursos de mestrado e doutorado no exterior, oferecendo condições de permanência mais vantajosas do que o retorno ao Brasil. É preciso um projeto efetivo, como o que vem sendo construído ao longo dos tempos nas gestões do Confea, para se ter maior internacionalização da atuação de empresas e profissionais brasileiros. Temos que abrir mercados no exterior para interagir com uma economia que hoje, todos reconhecem, é globalizada. É claro que temos que proteger nosso mercado, ter a nossa soberania, o nosso desenvolvimento tecnológico, mas é preciso interagir com o mundo todo.*

Assim sendo, a participação da delegação brasileira visou, prioritariamente, uma maior interação com representantes da American Society of Civil Engineers – ASCE, com o intuito de tratarem de temas atinentes ao exercício profissional das atividades correlatas ao exercício global da engenharia civil, notadamente quanto à concretização das tratativas iniciadas em 2015 e objeto de reuniões em 2016 e 2017, com vistas à assinatura de Acordo de cunho técnico.

- **Programação das atividades:**

Friday, October 12

12:00 - 7:00 p.m. | Registration
1:00 - 4:30 p.m. | Short Courses
12:00 - 4:30 p.m. | Community Service Project
1:00 - 4:00 p.m. | Technical Tours
5:30 - 7:00 p.m. | Welcome Reception

Saturday, October 13

6:45 a.m. - 5:00 p.m. | Registration
7:15 - 8:15 a.m. | Student & Emerging Leaders Welcome Breakfast and Orientation
7:30 a.m. - 5:00 p.m. | Communities and Pavilion
8:30 - 10:00 a.m. | Opening Plenary Session & Keynote
9:00 a.m. - 1:00 p.m. | Guest Program Orientation & Tour
10:00 - 10:30 a.m. | Networking Break in Pavilion
10:30 - 11:30 a.m. | Concurrent Sessions
*11:45 a.m. - 1:45 p.m. | Celebration of Leaders Luncheon - **SOLD OUT***
2:00 - 3:30 p.m. | Concurrent Sessions
3:30 - 4:00 p.m. | Networking Break in Pavilion
4:00 - 5:30 p.m. | Concurrent Sessions
6:00 - 9:00 p.m. | Optional evening tours

Sunday, October 14

7:00 a.m. - 5:00 p.m. | Registration
7:00 a.m. - 5:00 p.m. | Communities and Pavilion
7:30 – 8:15 a.m. | Networking Breakfast
8:15 – 9:45 a.m. | ASCE Annual Membership Meeting & Society Awards
9:00 a.m - 1:00 p.m | Optional tour
10:00 - 11:30 a.m. | Concurrent Sessions
11:30 a.m. - 1:00 p.m. | Lunch on your own
11:30 a.m. - 1:00 p.m. | Global Luncheon & Program (ticketed)
1:00 - 2:00 p.m. | Concurrent Sessions
2:15 - 3:45 p.m. | Industry Leaders Forum
3:45 - 4:15 p.m. | Networking Beverage Break
4:15 - 5:15 p.m. | Concurrent Sessions
6:00 - 9:00 p.m. | Optional evening tour

Monday, October 15

7:30 a.m. - 12:00 p.m. | Registration
7:30 a.m. - 12:00 p.m. | Communities and Pavilion
8:00 - 9:30 a.m. | Concurrent Sessions
9:45 - 11:15 a.m. | Concurrent Sessions
11:30 a.m. - 1:30 p.m. | Closing General Session & Luncheon

Em meio às atividades do Congresso, foi realizada reunião com a atual Presidente da ASCE, Eng. Civ. Robin Kemper, bem como com o Diretor Executivo da ASCE, Tom Smith, no dia 14 de outubro de 2018, para assinatura de Acordo entre o Confea e a ASCE.

3 – Relatório Técnico:

- Descrição detalhada da realização do evento, anexando folder, destacando os resultados e conhecimentos adquiridos, no desempenho da missão:

O Congresso foi realizado mesclando palestras e mini-cursos, intercalado por encontros gerais de todos os participantes, conforme documentação em anexo que retrata os temas e assuntos abordados.

No dia 14 de outubro de 2018 foi realizada reunião com a Presidente da ASCE, Eng. Civ. Robin Kemper e com o Diretor Executivo da ASCE, Tom Smith, para a assinatura de Acordo de Cooperação entre o Confea e a ASCE:

ASCE AMERICAN SOCIETY OF CIVIL ENGINEERS — CONFEA

ASCE and CONFEA have entered into this Agreement to facilitate the enhancement of the efforts of each organization to better serve the public and the engineering profession in its own country.

The type of activities considered under this Agreement may include, but are not limited to, the list of such activities contained in items 1 through 5 of this Agreement.

This Agreement will become valid upon approval by the governing bodies of the above organizations and will have a fixed duration of three years. It will be reviewed six months prior to the agreement termination date and will be automatically renewed for another three-year term if both organizations consider the Agreement to have been beneficial. Should the Agreement be deemed not beneficial by either organization, it will be terminated. It may also be terminated at any time prior to the date of expiration upon six-month's written notice from either of the organizations.

Amendments to the agreement may be made at any time but must be confirmed in writing by all organizations.

Each organization will nominate one person or office to be the focal point for communication with regard to detailed plans of action to be undertaken under this Agreement.

The fiscal details of specific programs proposed under this Agreement will be treated on a case-by-case basis, and the resultant financial plan must be approved by both organizations.

Activities contemplated under this agreement include, but are not limited to, the following:

1. Exchange of information regarding the engineering profession in general.
2. Encouragement of joint events of all kinds.
3. Encouragement of the exchange of students, lecturers, and guests.
4. Exchange of information regarding scientific and technical events that are of mutual interest.
5. Provide mutual professional advice, especially in all areas of international, technical and scientific matters to the extent provided by each organization to its own members.

American Society of Civil Engineers | Conselho Federal de Engenharia e Agronomia

ASCE AMERICAN SOCIETY OF CIVIL ENGINEERS — CONFEA

Signed

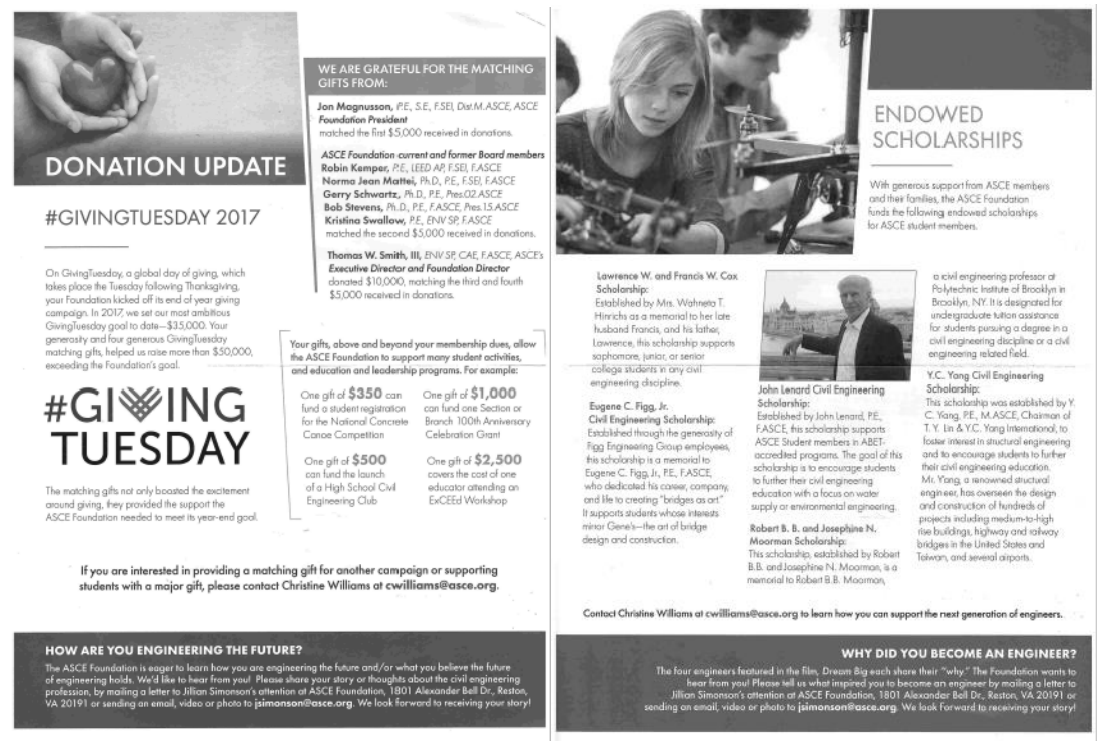
American Society of Civil Engineers (ASCE)	Conselho Federal de Engenharia e Agronomia (CONFEA)
President Robin A. Kemper, P.E., LEED AP, F.SEI, F.ASCE	President Joel Krüger (represented by Civ. Eng. André Schuring)
October 14, 2018 Date signed	14/out/2018 Date signed
Executive Director Thomas W. Smith, III, ENV SP, CAE, F.ASCE	Counselor Eng. Civ. Ricardo Augusto de Mello de Araújo
October 14, 2018 Date signed	14/out/2018. Date signed

American Society of Civil Engineers | Conselho Federal de Engenharia e Agronomia

Delegação brasileira com a ex-Presidente da ASCE, Engª. Civ. Kristina Swallow, com a qual as negociações para assinatura do Acordo de Cooperação tiveram início em 2016.

Assinatura do Acordo de Cooperação entre o Confea e ASCE.

Ademais, destacamos o vídeo Dream Big, por meio do qual a ASCE vem promovendo o incentivo busca por cursos de engenharia civil, notadamente para o público infanto-juvenil, cujos resultados práticos tem se mostrado extremamente interessantes. O vídeo encontra-se disponível em diversas plataformas online, inclusive Netflix:



DONATION UPDATE

#GIVINGTUESDAY 2017

On GivingTuesday, a global day of giving, which takes place the Tuesday following Thanksgiving, your Foundation kicked off its end of year giving campaign. In 2017, we set our most ambitious GivingTuesday goal to date—$35,000. Your generosity and four generous GivingTuesday matching gifts, helped us raise more than $50,000, exceeding the Foundation's goal.

#GIVING TUESDAY

The matching gifts not only boosted the excitement around giving, they provided the support the ASCE Foundation needed to meet its year-end goal.

WE ARE GRATEFUL FOR THE MATCHING GIFTS FROM:

Jon Magnusson, *P.E., S.E., F.SEI, Dist.M.ASCE, ASCE Foundation President* matched the first $5,000 received in donations.

ASCE Foundation current and former Board members
Robin Kemper, *P.E., LEED AP, F.SEI, F.ASCE*
Norma Jean Mattei, *Ph.D., P.E., F.SEI, F.ASCE*
Gerry Schwartz, *Ph.D., P.E., Pres.02.ASCE*
Bob Stevens, *Ph.D., P.E., F.ASCE, Pres.15.ASCE*
Kristina Swallow, *P.E., ENV SP, F.ASCE*
matched the second $5,000 received in donations.

Thomas W. Smith, III, *ENV SP, CAE, F.ASCE, ASCE's Executive Director and Foundation Director* donated $10,000, matching the third and fourth $5,000 received in donations.

Your gifts, above and beyond your membership dues, allow the ASCE Foundation to support many student activities, and education and leadership programs. For example:

One gift of **$350** can fund a student registration for the National Concrete Canoe Competition

One gift of **$1,000** can fund one Section or Branch 100th Anniversary Celebration Grant

One gift of **$500** can fund the launch of a High School Civil Engineering Club

One gift of **$2,500** covers the cost of one educator attending an ExCEEd Workshop

If you are interested in providing a matching gift for another campaign or supporting students with a major gift, please contact Christine Williams at cwilliams@asce.org.

HOW ARE YOU ENGINEERING THE FUTURE?

The ASCE Foundation is eager to learn how you are engineering the future and/or what you believe the future of engineering holds. We'd like to hear from you! Please share your story or thoughts about the civil engineering profession, by mailing a letter to Jillian Simonson's attention at ASCE Foundation, 1801 Alexander Bell Dr., Reston, VA 20191 or sending an email, video or photo to **jsimonson@asce.org**. We look forward to receiving your story!

ENDOWED SCHOLARSHIPS

With generous support from ASCE members and their families, the ASCE Foundation funds the following endowed scholarships for ASCE student members.

Lawrence W. and Francis W. Cox Scholarship: Established by Mrs. Wahneta T. Hinrichs as a memorial to her late husband Francis, and his father, Lawrence, this scholarship supports sophomore, junior, or senior college students in any civil engineering discipline.

Eugene C. Figg, Jr. Civil Engineering Scholarship: Established through the generosity of Figg Engineering Group employees, this scholarship is a memorial to Eugene C. Figg, Jr., P.E., F.ASCE, who dedicated his career, company, and life to creating "bridges as art." It supports students whose interests mirror Gene's—the art of bridge design and construction.

John Lenard Civil Engineering Scholarship: Established by John Lenard, P.E., F.ASCE, this scholarship supports ASCE Student members in ABET-accredited programs. The goal of this scholarship is to encourage students to further their civil engineering education with a focus on water supply or environmental engineering.

Robert B. B. and Josephine N. Moorman Scholarship: This scholarship, established by Robert B.B. and Josephine N. Moorman, is a memorial to Robert B.B. Moorman, a civil engineering professor at Polytechnic Institute of Brooklyn in Brooklyn, NY. It is designated for undergraduate tuition assistance for students pursuing a degree in a civil engineering discipline or a civil engineering related field.

Y.C. Yang Civil Engineering Scholarship: This scholarship was established by Y. C. Yang, P.E., M.ASCE, Chairman of T. Y. Lin & Y.C. Yang International, to foster interest in structural engineering and to encourage students to further their civil engineering education. Mr. Yang, a renowned structural engineer, has overseen the design and construction of hundreds of projects including medium-to-high rise buildings, highway and railway bridges in the United States and Taiwan, and several airports.

Contact Christine Williams at cwilliams@asce.org to learn how you can support the next generation of engineers.

WHY DID YOU BECOME AN ENGINEER?

The four engineers featured in the film, *Dream Big* each share their "why." The Foundation wants to hear from you! Please tell us what inspired you to become an engineer by mailing a letter to Jillian Simonson's attention at ASCE Foundation, 1801 Alexander Bell Dr., Reston, VA 20191 or sending an email, video or photo to **jsimonson@asce.org**. We look forward to receiving your story!

COMING ATTRACTIONS — Student Activities

AEI Student Design Competition: *April 4-6, 2018*
The *AEI Student Design Competition*, a program of the Architectural Engineering Institute (AEI) of ASCE, is an opportunity for undergraduate and graduate students to demonstrate knowledge and skills that will make them valuable building industry professionals. This competition emphasizes the development and integration of innovative solutions to competitive design challenges, collaboration, and peer review. Teams respond to a challenge with a written submission, similar to a design development submittal, which addresses overall building system design issues and describes how the engineered systems work with and complement other engineering disciplines and architecture. Finalists will present during the AEI Biennial Forum hosted by The Durham School of Architectural Engineering and Construction, University of Nebraska-Lincoln in Omaha, NE.
More competition information is available here: **https://www.asce.org/architectural-engineering/aei-student-competition/**

National ASCE/AISC Student Steel Bridge Competition: *May 25-26, 2018*
This inter-collegiate challenge supplements civil engineering students' education by providing a comprehensive, student-driven project experience that includes conceptualizing, designing, fabricating and constructing a steel bridge that meets client specifications and optimizes performance and economy. Sponsored by the American Institute of Steel Construction in co-operation with ASCE, the Steel Bridge Competition increases students' awareness of real-world engineering issues such as spatial constraints, material properties, strength, serviceability, fabrication and erection processes, safety, esthetics, project management, and cost. Successful competition requires the application of engineering principles, theory and effective teamwork. Future engineers are stimulated to innovate, practice professionalism, and efficiently use structural steel.
The ASCE Student Chapter of the University of Illinois Urbana-Champaign in Champaign, IL, will host the 2018 National ASCE/AISC Student Steel Bridge Competition. More competition information is available here: **https://www.aisc.org/education/university-programs/student-steel-bridge-competition/**

National ASCE Concrete Canoe Competition: *June 23-25, 2018*
The Concrete Canoe Competition is designed to provide civil engineering students hands-on, practical experience, and leadership skills while working with concrete to design, construct, and race water-worthy canoes. This competition helps build awareness of concrete technology and application, as well as, the versatility and durability of concrete as a construction material, among civil engineering students, educators, practitioners, and the general public. It also teaches industry leaders, opinion makers, and the general public about the importance of civil engineering to society.
The ASCE Student Chapter of San Diego State University will host the 2018 National ASCE Concrete Canoe Competition. More competition information is available here: **https://www.asce.org/event/2018/concrete-canoe/**

CI Student Days: *August 3-7, 2018*
CI Student Days, a program of the Construction Institute (CI) of ASCE, brings together top engineering students from across the country and potential employers seeking new talent. This program helps students transition to professional engineering by providing tools to help them stand out in a competitive job market and opportunities to enhance and showcase their engineering knowledge and skills. In addition to participating in the *CI Heavy Civil Engineering Team Challenge*, where students create and present a written and oral proposal for a real-word construction job to construction professionals, students are given several opportunities to network with their peers, construction professionals, and potential employers. 2018 *CI Student Days* will be held in San Diego, CA.
More information about this event is available here: **http://www.ascestudentdays.org/**

Gifts, above and beyond your annual membership dues, help your Foundation support ASCE programs that invest in student activities, leadership, and education.

ASCE FOUNDATION
NEWSLETTER: FEBRUARY 2018

MACGILLIVRAY FREEMAN'S
DREAM BIG
ENGINEERING OUR WORLD

This month marks one year since *Dream Big: Engineering Our World* premiered in museums and science centers in North America. The film, presented by Bechtel and produced by MacGillivray Freeman Films in partnership with ASCE and support from ASCE Foundation, opened to glowing reviews, surpassed 1 million paid viewers less than six months after its release, and won 4 honors from the Giant Screen Cinema Association (GSCA) 2017 Achievement Awards, which are akin to the Oscars of the IMAX® industry.

Dream Big reveals how engineers solve challenges and enhance the human experience. The film takes viewers on a journey across the globe to show engineering wonders and tell the inspirational stories of four engineers from diverse backgrounds. Developed as the nucleus of the *Dream Big Project*, an outreach campaign to encourage engineering careers, *Dream Big* has been shown in more than 75 theatres in the U.S. and abroad, including venues in England, Kuwait, and Russia.

DREAM BIG: ONE YEAR LATER

Reached **1 million** paid viewers in less than 6 months

Approximately ½ of attendees are under 17 years of age

Received **4** Best Short Subject Film awards

Received **1 Power of A Silver Award** from the American Society of Association Executives

Shown in more than **75** theatres domestically and internationally

Earned a coveted **100%** on the Rotten Tomatoes film review site

ASCE leads the *Dream Big Project* with the ASCE Foundation, Bechtel, the United Engineering Foundation, the National Council of Examiners for Engineering and Surveying and a coalition of engineering organizations. To support the *Dream Big Project*, ASCE helped develop a series of events and resources, including a K-12 educator guide, lesson plans, webisodes, and more than 50 hands-on activities for students, parents, and teachers. To help inspire more youth, ASCE plans to distribute *Dream Big* educational toolkits to every public school in the U.S. The toolkit will include an educator's guide and accompanying educational videos.

Help ASCE members bring the exciting *Dream Big* experience to more communities through outreach activities, member programs, industry events, and more! **Give a gift** to extend the film's reach and impact.

4- Proposições/ Recomendações a serem aplicadas no Sistema pela experiência adquirida:

Assim sendo, sugerimos a implementação do Acordo de Cooperação firmado entre o Confea e a ASCE, com vistas, prioritariamente, a oferecer aos engenheiros civis registrados no Sistema Confea/Crea a possibilidade de acesso irrestrito aos cursos e treinamentos oferecidos pela ASCE, sem a necessidade de estarem registrados naquela entidade, bastando para tanto terem registro ativo no Sistema Confea/Crea.

5 – Conclusão:

Descrição detalhada da avaliação do evento, destacando os aspectos positivos e/ou negativos, para futuro planejamento e aperfeiçoamento de viagens semelhantes:

Não vislumbramos pontos negativos tanto na preparação, quanto na execução e conteúdo técnico do Congresso, os quais foram estruturados de maneira exemplar.

Finalmente, vislumbramos como sendo de grande relevância a assinatura do Acordo de Cooperação, o qual sugerimos a aprovação pelo Plenário do Confea, para que possam ocorrer as ações decorrentes, principalmente o oferecimento de cursos e treinamentos *online* aos profissionais registrados no Sistema Confea/Crea.

Desta feita, nos termos do art. 6º da Resolução nº 1.009, de 17 de junho de 2005, apresentamos o presente relatório conjunto, com vistas à análise e decisão do Conselho Diretor do Confea.

Denver - EUA, 15 de outubro de 2016.

Eng. Civ. André Luiz Schuring – Conselheiro Federal

Eng. Civ. Ricardo Augusto Mello de Araújo – Conselheiro Federal

Eng. Civ. Luis Edmundo Prado Campos – Representante do Colégio de Presidentes

Eng. Civ. Jorge Luiz Muniz de Mattos – Representante da Coordenadoria de Câmaras Especializadas de Engenharia Civil

Eng. Agr. Flávio Bolzan – Assessor do Confea