Dear Colleagues,

Season’s greetings on behalf of SDP! I am so thankful to have been able to work so closely with so many of you throughout 2018.

It has been an amazing year for our organization, and I am eager to share with you our progress in several key areas. I have also greatly appreciated our continuing correspondence on the opportunities you see for decision professionals in the era of big data analytics and Artificial Intelligence. Please keep the ideas coming.

As I hope you are aware, registration for DAAG 2019 in Denver, Colorado, is now open! In addition to serving as SDP’s annual conference, DAAG is the premiere event in the world for leaders who want practical approaches to improve decision-making in their organizations with lessons and insights from across a wide-range of industries. In keeping with our theme of “Data + Decisions,” we will discuss the ways in which advances in Data Science, Machine Learning, and Artificial Intelligence are making the skills of decision professionals more valuable every day and the unique role we will play in leading such initiatives going forward.

Our week in Denver will kick off with a slate of top-notch SDP-sponsored workshops on Tuesday and Wednesday, March 5th and 6th, followed by the DAAG conference itself on March 7th and 8th. Additionally, DAAG’19 will mark the occasion of our 25th DAAG during which we will reflect back on the history of our unique annual gathering and take a moment to thank those who have played an integral role in the conference we’ve grown to love so much.

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President’s Message, continued from page 1

As in past years, SDP Members will see significant savings when they register for DAAG and our pre-conference workshops. Members who register to attend DAAG plus four SDP Workshops will save almost 50% vs non-members. And non-members can opt to become SDP members at the time of their DAAG registration, allowing them to save as well. Visit DAAG.io to learn more about how you and your colleagues can attend DAAG’19 and/or participate in one or more of our compelling pre-conference workshops.

One last DAAG-related note: it takes an army of volunteers to deliver such a world-class event. And while we still have much to do, I would like to give special thanks to Hilda Cherekdjian for her tireless efforts in support of DAAG, as well as express my sincere gratitude to passionate leaders like Jerry Lieberman, Jay Andersen, Pat Leach, and our DAAG co-chairs, Somik Raha and Jon Mauer. Also deserving of our thanks are those who have agreed to donate their time as workshop instructors – you won’t want to miss the opportunity to learn from these preeminent experts – as well as all of those who have served on the DAAG Program and Logistics Committees, the SDP Program Council, DAAG Marketing committee and the DAAG DRB. Thank you all!

In addition to these DAAG-related announcements, I would like to draw your attention to a few other important developments:

• SDP Chapters have recently been formed in the San-Francisco Bay Area and in Vancouver, British Columbia. Please join me in welcoming these new additions to our growing network of local chapters!
• The Board has undertaken the challenge of identifying SDP’s website platform of the future. If you have web-related skills or know someone who does, please do not hesitate to reach out.
• Ellen Coopersmith and Carl Spetzler delivered a very popular SDP-sponsored workshop in London this past November. Thank you Ellen and Carl!

And last, but not least, I am happy to announce that, since our last newsletter, SDP has grown to well over 500 members with many more expected to join in the coming weeks. I hope you see what I see in the achievement of this milestone: a vibrant community of like-minds that is primed for even greater growth.

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Finally, let’s circle back to the topic of what role decision professionals are likely to play in a future where machines, in the form of AI and related tools, will dramatically reduce the cost of predictive analysis. Rather than analytical horsepower, will such a world look to us for sound judgment, effective facilitation, and/or the ability to clarify objectives or generate new alternatives? How are you seeing the work of decision professional’s change as big data analytics and AI sweep through your industry? If so inclined, please share your thoughts with me on this topic via the email address below.

Thank you for all that you do in support of SDP. May 2019 hold nothing but good outcomes for you and yours.

Best,
Jim Driscoll
(james.r.driscoll@intel.com)

Upcoming Events

• **Webinar: Which Part of Your Data Analytics Dollar is Wasted? - Decision Analysis as Guidance for Data Analysis**
  Wednesday, December 19, 2018
  8 am PT | 11 am ET

• **DAAG 2019**
  March 5 – 8, 2019
  GRAND HYATT DENVER
  1750 Welton Street
  Denver, CO, 80202, US

**Save the Date!**
**SMDM 41st Annual Meeting:**
Portland, OR
October 20 - 23, 2019
The meeting theme is *Many Views on Value*.

Meeting co-chairs: Karen Eden, PhD, Carmen Lewis, MD, MPH and Dan Matlock, MD

Do you know of upcoming professional events that might be of interest to other SDP members? If so, please email the SDP newsletter at newsletter@decisionprofessionals.com
New Certifications

Congratulations to our two newest certifications, Nikolas Weissmueller – Lead Practitioner and Everett Salas – Practitioner.

Nikolas T. Weissmueller, PhD – Lead Practitioner.

Nikolas Weissmueller is a clinical development strategy analyst at Bristol-Myers Squibb (BMS). As Associate Director in BMS’s Business Insights and Analytics team, he evaluates and optimizes clinical development strategies for early and late stage medicines in the company’s Oncology and Immuno-Oncology (I-O) portfolio.

He provides decision analysis support for Empliciti®, Yervoy®, and Opdivo ® clinical development teams, and supports asset and portfolio strategy for BMS's China and Japan R&D organizations. Prior to joining Bristol-Myers Squibb, he was a Postdoctoral Researcher in the Chemical and Biological Engineering Department at Princeton University, where he directed immunology and oncology-focused industry collaborations. He earned a Ph.D. in Medical Sciences and a M.Sc. in Biomedical Engineering from the University of Oxford, UK, and holds an Engineering undergraduate degree from Harvard.

Everett Salas – Practitioner.

Everett joined Chevron in 2013 as a Decision Analysis Advisor where his responsibilities have included conducting analytical evaluations in support of Strategic Planning, including probabilistic production and capital forecasting, providing analysis on the economic impacts of various California legislative and regulatory measures, providing decision analysis support for legal and commercial projects and conducting formal and informal training on the application of Decision Analysis.

He has a BS in Biology from Cal Poly Pomona, an MS in Molecular Biology and a PhD in Geology, both from the University of Southern California.

To learn more about certification, contact Leslie Lippard at llippard@gmail.com.
The London Decision Quality Conference Was a Big Success
Andrea Dickens

The first ever London Decision Quality conference was held on the 5th & 6th November 2018 at the Geological Society. The event was jointly organised by the Society of Decision Professionals, the European Decision Professionals Network and the London Decision Quality Group and attracted 120 attendees from a wide range of countries and companies. The conference was designed around the 6 Decision Quality elements and was followed by an SDP-sponsored course on “Leading Decision Quality”.

Key highlights from the conference:

- Leading DA practitioners, Carl Spetzler, Ellen Coopersmith and Reidar Bratvold, explained the origins and the importance of DQ; why we need to be clear about the goals; and how to choose between which tools we should use.
- Insights on how companies are using and embedding DQ concepts came from Jim Weatherall (AstraZeneca), Russell Smith & Colin McGill (BP), Ray Riddoch & Craig Paveley (CNOOC Nexen), Jeremy Brann (Shell) and John Chaplin (ExxonMobil retired).
- Cath Bishop led an interactive session drawing on her experiences as an Olympic Rower, former diplomat and leadership consultant to demonstrate how our mindset, assumptions and biases affect how we frame a problem.
- Understanding how cognitive biases corrupt thinking and decision making and how to mitigate their effects was the theme of a workshop run by Dominic Brittain using the experience he learnt over 30 years’ working in bomb disposal.
- A Software Roadshow, with stands from Aucerna, DecisionFrameworks, Palisade and Syncopation allowed attendees to see the benefits of using different package.
- Finally the conference gave the attendees a chance to practice what they had heard on real problems from 4 start-ups (Clustermarket, Trozon, Dynium and Grazer).

Participants’ feedback was that this was one of the best designed conferences they had attended. In particular they appreciated having company leaders present and the focus on solving real world problems.

The next European Decision Quality conference is being planned for the Autumn 2020. For more information please visit the EDPN website (www.edpn.org) or email info@edpn.org.
SMDM 40th Annual Meeting in Review: Montreal, Canada
by Trevor Scholl, Association Manager, Society for Medical Decision Making

Experts from a variety of fields in medical decision making gathered in Montreal, Canada from October 13 - 17, 2018 for the Society for Medical Decision Making (SMDM) 40th Annual North American Meeting.

525 attendees attended the four-day event, which included a plethora of workshops, symposia, and presentations on medical decision making, with a focus on Decision Making Across the Lifespan. The meeting was certified as a Patients Included Conference and patients were involved in the planning of the meeting and served as presenters on symposium panels and were encouraged to speak from the audience during Q&As.

Meeting co-chairs Dr. Holly Witteman and Dr. William Dale and patient co-chairs Beverly Canin and Isabel Jordan provided a warm welcome to attendees on Monday morning. Elder Joe McGregor, a Kanien’keh’a:ka elder, opened the meeting with Ohenton Kariwatehkwen, "the words that come before all else." Dr. Monica E. Peek, Associate Professor in the Section of General Internal Medicine at the University of Chicago was this year’s Keynote Speaker. Dr. Peek discussed how structural inequities impact health disparities across the lifespan.

Awards were presented to key leaders and mentors in the field of medical decision making: Dr. Murray Krahn received the SMDM Award for Distinguished Service; Dr. Lisa Prosser received the John M. Eisenberg Award for Practical Application of Medical Decision-Making Research; and Dr. Myriam Hunink received the SMDM Career Achievement Award. SMDM also recognized Dr. Allan Detsky for his recent appointment as a Member of the Order of Canada.

The Outstanding Paper by a Young Investigator was awarded to Dr. Jarrod Dalton. 10 trainees received the Lee B. Lusted Finalists Student Prize for outstanding presentations of research and 3 trainees received awards for their research in Sex- and Gender-Based Analysis. The Lusted Student Award for Quantitative Methods and Theoretical Developments was renamed this year in honor of a distinguished member of the SMDM community, Dr. Stephen Pauker.

Past President Dr. Uwe Siebert passed the gavel to incoming President Dr. Heather Taffet Gold at the SMDM Annual Business Meeting to officially start Dr. Gold's term as President.
Decision Quality Workshop Held for the International School Eindhoven
Kuno Huisman

On March 1, 2018, ASML (a high-tech company in the Netherlands) hosted 66 first year International Baccalaureate Diploma (DP1) students from the International School Eindhoven (ISE) for a Decision Quality workshop. The students in this first year of a two year program are typically 16-17 years old. The workshop was successfully organized and executed by the Decision Support team of ASML. The workshop was highly appreciated by the students as is clearly visible in the survey results:

The workshop was initiated by SDP member Kuno Huisman, who is heading the ASML Decision Support team and next to that part-time full professor at Tilburg University at the ASML-endowed chair of Decision Making under Uncertainty. At the 2016 European Decision Professionals Network (EDPN) conference in Copenhagen, Kuno attended the session led by Chris Spetzler of the Decision Education Foundation (DEF) and that is where the initial thoughts of this event started. After his inauguration speech in July 2017, Kuno reached out to ISE and offered to organize a Decision Quality workshop for their students. It was agreed that the workshop would be held for DP1 students as most of them were still in the process of finding an answer to the question “The year after DP2, what will I be doing?”. Furthermore, the idea was born to do the workshop at ASML premises.

The Decision Support team started preparing the content for the workshop and in cooperation with ISE a booklet for the students was created. For the content of this booklet and the workshop the team made heavy use of the available DEF material.

The workshop started at 9:00 am with one hour of plenary theory. After that subgroups were formed and in these subgroups the students started working in their booklets. This means that they worked on framing their decision, describing their values, creating alternatives, describing useful information, sound reasoning, and their commitment to follow through. Next to that the students also visited the ASML Experience Center, a place where the technology of ASML and its place in the semiconductor industry is displayed. The workshop came to an end at 12:30 pm with a plenary wrap up. The plan is that the workshop will be repeated in 2019 for the new class of DP1 students of ISE.

Some reactions of the students: “I really loved the critical thinking part this morning! I will continue to use this.”, “I now realize that my study choice number 2, has become number 1, after having filled in the grid of alternatives versus values...I need to go over it again...”, “wow, this is a powerful tool...”, “I am going to go over it again and seriously look at the alternatives that I hadn’t even considered...”.

About ASML
ASML's vision is to enable affordable microelectronics that improve the quality of life. To achieve this, their mission is to invent, develop, manufacture and service advanced technology for high-tech lithography, metrology and software solutions for the semiconductor industry.
SDP Council Focus

Certification Council:
The certification council would like to congratulate our two most recently certified members, Nicolas Weissmueller (lead practitioner) and Everett Salas (practitioner). We would also like to thank their colleagues who supported the certification process with testimonials.

The Certification Council is actively working to increase the profile of certification both within our organization and in the DA community in general. To that end, we are looking to increase the number of people who are certified-- we believe that there are many qualified people who have simply never applied for certification. If this is you, please think about applying. If you are certified, but know someone who should be but is not, please encourage them to apply.

Finally, we the Certification Council is actively looking for new members to join the council. If you have a passion to recognize people who are contributing to the practice of DA and growing our footprint in industry, in the not for profit world, in academia, or in the daily lives of people who make decisions, we would love to have your energy and perspective. Reach out to Leslie Lippard, lippard@gmail.com for more information or to volunteer.

Chapter and Outreach Council:
The SDP Chapter and Outreach Council has officially launched and over the next year will focus on implementing actions to support both new and existing SDP chapters. We are also looking for new council members! Please reach out to Jeremy Walker at jeremywalker@decisionframeworks.com or Laura Keating at lmkeating@gmail.com if you would like to join this council or have any questions.
Chapter News

San Francisco Chapter
On November 15, 2018, 16 people gathered in San Mateo, CA to inaugurate the San Francisco Bay Area Chapter of the Society of Decision Professionals. The meeting, which was organized and led by Brian Putt, drew a group ranging from old-timers to a few who were not even aware of the existence of SDP. The program started with a brainstorming session on the kinds of activities that the new chapter should pursue. Max Henrion then gave an abbreviated version of the presentation he had given at the recent INFORMS meeting in accepting the 2018 Frank P. Ramsey Medal for distinguished contributions to decision analysis. The meeting closed with tentative plans for the timing and location of future meetings of the chapter.

Houston Chapter
Matthew Kurtz, Chapter President of the Society of Decision Professionals – Houston, sends notice that the chapter will hold the Quality Decision Making in the Energy Sector Summit next year on April 12, 2019. The summit will take place at the easy-to-access Norris Center located at I-10 and Beltway 8 near the Energy Corridor. Registration opens soon via the SDP website.

Matt states, “The industry outlook seems more optimistic, but we can all benefit by leveraging the experience of our members and developing more effective personal connections.”

The one-day event will give energy professionals an opportunity to learn from top industry executives and thought leaders, network with others, and learn more about both the local SDP chapter and national organization. Several executive keynotes and papers by experienced professionals are confirmed, but places remain for other presentations. If you would like to attend or present, contact: Matthew Kurtz – SDP-H President: Matthew.Kurtz@worleyparsons.com or Carol Liffman: carol.kazmerliffman@gmail.com
SDP member Jennifer Harrington is one of a team of nine in the Decision Quality Program Office at Intel Corporation, which is led by Jim Driscoll, the current SDP President. Along with her teammates, Jennifer divides her time between leading internal courses that teach Intel executives and their staff how to achieve high decision quality and mentoring those staff members as they apply what they have learned to actual company decision-making. She also helps manage the operations of the DQ Program Office.

Jennifer has a background in finance, with a bachelor’s degree in economics and an MBA in finance and corporate accounting. While previously working at Intel in a traditional finance role, she happened to encounter the analytic side of DQ. Intrigued, she took the Introduction to Decision Quality course, where, she says, her eyes were opened to the full power of the DQ process, including careful framing to clearly identify the decision to be made and generating alternatives to explore what can be possible. She shortly afterwards joined the DQ Program Office to serve as a decision specialist.

Occasionally, Jennifer finds it valuable to use the DQ approach in her personal life. She recalls one incident when her brother called her for advice on what to do about a sick pet dog. The vet had suggested a number of expensive tests to be administered to the dog. Through careful questioning, Jennifer learned that the treatment plan for the dog was very unlikely to be changed by the results of the tests. Knowing that the tests offered nearly zero value of information, she was confident in advising that the tests not be administered.

One of the greatest satisfactions that she has experienced as a decision professional came in the first decision that she worked on at Intel – whether or not the company should continue developing an interesting technology that did not have an immediate use in the product line. She led a team of 8-10 people through the entire Dialogue Decision Process, including framing workshop, alternatives workshop, and analytic evaluation of the alternatives. As a result of the process, a hybrid alternative with an incremental expected value 6x greater than the original strategy was recommended to the decision maker and decision board. A clear decision was made and the feedback was strongly positive from both decision maker and fellow project team members.

Although Jennifer has seen the tremendous value of DQ, she and the Program Office continue to address a couple of big challenges in the successful implementation of DQ. One is overcoming the many biases that are prevalent and often prevent organizations from reaching clarity on making a good quality decision. Another is the misperception by some people that there is only one way to do a decision process rather than seeing that the process can and should be tailored to the decision at hand.

Jennifer is an active member of the SDP. She was elected to the Board of Directors in 2017 and also serves on the Membership and Communications Council. She values her membership in SDP because she enjoys being a part of a group of people who are passionate about DQ. She considers the annual DAAG conference a highlight and is especially excited to hear about applications of DQ in the non-profit sectors. Jennifer is a huge advocate and supporter of helping SDP push for much wider adoption of DQ in the working world.
Dear SDP Fellows: "How do you think developments in AI and big data analytics will change decision professionals’ practice?"

Given that a good bit of our work with airline customers incorporates machine learning to develop and feed AI tools, perhaps I can provide one perspective on the question of AI and big data. A key difference we have found is that AI opens up a world of decisions that can be based on historical and ongoing data collection relevant to future outcomes. It greatly improves on the traditional forecast models many marketing or operating groups have used, and they seem to be more receptive to a new way to explore their data rather than a DA methodology that asks them to be the SMEs for a subjective assessment of uncertainty.

Much of the initial structuring of a machine learning opportunity is common to the structuring of a decision analysis. Teams first need to truly understand their question, their objectives and the type of decision(s) that will be informed by the results. This sounds pretty familiar to a DA professional. However, instead of framing a set of alternatives and creating a decision model, machine learning requires quite a different way of using the domain expert's knowledge. They need to clarify whether they would like to categorize their choices in some manner, forecast an outcome of a key parameter or identify anomalies that can provide insight into the decisions to be made. For example, a choice categorization could be used to forecast whether a new market is likely to be profitable or not. A forecast example could be used to quantify the likely fuel requirement at an airport for a month. An anomaly detection model can be used for predictive maintenance timing.

There are no range or probability assessments to gather. Machine learning feels a bit like a mirror image of the DA process. Instead of using a model and ranges for analyzing and comparing alternatives, the domain expert’s knowledge is used to train the machine in the logic of how to interpret the quantitative and qualitative data by creating a few clearly distinct examples from which the machine learning algorithm can learn. The learning by the machine happens by going through mountains of information to find combinations of data that create outcomes it has been “trained” to recognize. As the machine works through more and more data and the domain experts adjust the “training” guidance, the confidence level of the categorization or quantitative predictions increases significantly.

The new capabilities to use big data are an opportunity for decision professionals. It does require learning many new concepts, but there are a lot of skills to leverage as well. You are likely to be invited to help with a broader set of decision situations. The fun part of the process is noodling through the situation with a decision maker to clarify just what type of situation you have and which approach will yield the most insight, which should feel pretty familiar.

SDP Fellow Gerald A. Bush provided the answer for this question.

If you have a question for the SDP Fellows about good practice among decision professionals, please send it to us at SDP Newsletter: Ask The Fellows.
A Word From SDP Sponsor Decision Frameworks

In every issue of this newsletter, we include a message from one of the SDP sponsors, whose support contributes significantly to the on-going success of the Society.

Decision Frameworks is a renowned and unique Decision Quality enablement firm providing consulting, practical case-based DQ training, and software to build sustainable Decision Quality cultures within client organizations. Our company champions Decision Quality through engagements ranging from full implementations to targeted support of in-house teams. Skill development is fostered through hands-on practicums and real-world workshops supported by state of the art Decision Quality software. Founded in 1999, Decision Frameworks has offices in Houston, Calgary, London, Hamburg and Adelaide and services clients worldwide.

At Decision Frameworks, we liken sustainable Decision Quality implementation to launching a successful technology. For technologies to be successful, they must “cross the chasm” - take the use of the technology out of the hands of the early adopters who believe in it, and spread its use to the larger market of pragmatic users. To do this, the technology and the use of Decision Quality mindset and principles must be made easy...to culturally become the way of thinking, and the way of working. The purpose of Decision Frameworks toolset is to make the practical application of DQ easy for both the expert and the everyday professional. The design of Decision Frameworks training is founded on: Relevance, Repetition and Ease of Use. Courses always include working relevant case examples, going around the race track numerous times applying DQ principles and making the application of DQ easy through guiding software.

As a founding member of SDP, Decision Frameworks shares the Society’s overall goal of increasing DQ awareness, application and accreditation. We have very much enjoyed contributing to the drive, energy and vision of SDP as it builds its professional reputation, for which all members can feel proud. We are very excited about the opportunities and challenges ahead as SDP addresses the needs of the next generation of practitioners.

As current practitioners, it is our hope that you and members of your organization will join us in one of our open enrollment courses or free webinars, reach out to us when you have a project team in need, or have questions about how to move your implementation to the next level. Consider licensing our time-saving and easy-to-use Decision Quality software tools: D Trio – for Decision Framing, D Trio XL - for Value of Information and TreeTop - for Uncertainty Analysis, so that you can democratize and broaden the use of critically important, yet uncommon DQ skills in your organization.

Find out more at www.DecisionFrameworks.com or contact Jeremy Walker, Vice President, Decision Frameworks, jeremywalker@decisionframeworks.com or Ellen Coopersmith, President & Founder, Decision Frameworks, ellencoopersmith@decisionframeworks.com, ph: 713-647-9736.
Congratulations to David Matheson

The correct answer to the brain teaser posed in the September issue is that the four pieces of stone weigh 1, 3, 9, and 27 pounds. A full explanation of the solution can be found by clicking here. David Matheson was the first to submit the correct answer.

THE DECEMBER BRAIN TEASER

Instructions: You can win “bragging rights” by being the first to submit the correct answer of this brain teaser to the newsletter editors (SDP Newsletter: Brain Teaser). We will announce the winner in the next issue.

Three Silos

There are three grain silos of different sizes: 8,000 bushels, 5,000 bushels, and 3,000 bushels. The 8,000 bushel silo is full, the other two are empty. By pumping grain between these silos (and with no other means of measurement), how can you wind up with 4,000 bushels of grain in each of the two bigger silos?

Useful Links

The SDP Board has posted the Society’s Bylaws and Policy and Procedure Manual, which can be found at: http://www.decisionprofessionals.com/about/governance

The SDP Knowledge Sharing Council maintains a Fellows Blog at: http://www.decisionprofessionals.com/?scrollTo=blog-news#blog-news

A listing of courses in decision analysis available to SDP members is at: http://www.decisionprofessionals.com/courses/training-program

Join Us in Producing the SDP Newsletter

We, the editors, are actively looking for other SDP members to join us in producing this newsletter. If you are interested, please contact us. Click here to email the editors.

Matt Gorman and Steve Tani
SDP Newsletter Editors