



# ANNUAL REPORT

## 2019





# Table of contents

<b>I. ADMINISTRATIVE INFORMATION .....</b>	<b>1</b>
a. Registered office	
b. Bylaws	
c. President and Vice-President	
d. Managing Director	
e. Communications and Office Manager	
f. Resignation and Nomination of Directors	
<b>II. MEMBERSHIP AND PARTNERSHIP SITUATION .....</b>	<b>2-3</b>
<b>III. ACTIVITIES .....</b>	<b>4</b>
a. Website	
b. Newsletter	
c. Extranet	
d. Video	
e. EUPAVE Publications	
f. EUPAVE Events	
g. EUPAVE Webinars	
<b>IV. REPRESENTATION .....</b>	<b>16-19</b>
<b>V. INTERNAL WORK .....</b>	<b>19</b>

# I. ADMINISTRATIVE INFORMATION

## a. Registered office

The address and telephone number of EUPAVE remain:

EUPAVE  
Boulevard du Souverain , 68- B13  
1170 Brussels

Telephone number:  
+ 32 (0)2 645 52 31

## b. Bylaws

The bylaws of association were modified at the Extraordinary General Assembly held on 3 December 2015. The revised version is available in French and in English. In case of differences between the two versions, the French version shall prevail.

## c. President and Vice-President

EUPAVE's President remains Mr. Stéphane Nicoud from LafargeHolcim.

Mr. André Burger from Cement & Beton Centrum retired and left his position of Vice-President of EUPAVE on 1<sup>st</sup> July 2018.

Mr. Rory Keogh from GOMACO took over the position on 1<sup>st</sup> July 2018.

## d. Managing Director

Mr. Luc Rens, Consulting Engineer at FEBELCEM remains in the function of Managing Director of which he was nominated during the EUPAVE Board meeting of 23 March 2009.

## e. Communications and Office Manager

Ms. Elise Carabédian is Communications and Office Manager since 2 November 2016.

## g. Resignation and Nomination of Directors

The mandates renewed as of 19 June 2019:

- Mr. Jan Deja,
- Mr. Ulrich Nolting,
- Mr. Aniceto Zaragoza resigned from his mandate of Director of Board and Mr. Jesús Diaz Minguela took over Mr. Aniceto Zaragoza's mandate as of 19 June 2019.

The Board of Directors is composed of the following members as of 19 June 2019:

- Koen Coppenholle, Chief Executive of CEMBUREAU;
- François Redron, Chief Executive of Cimbéton;
- André Jasienski, Director of FEBELCEM;
- Rory Keogh, Managing Director of GOMACO Int'l Ltd;
- Stéphane Nicoud, Head of Large Construction Projects, Holcim Technology Ltd;
- Ulrich Nolting, Managing Director of InformationsZentrum Beton GmbH;
- Jesús Diaz Minguela, Director of IECA Tecnología;
- Sebastian Spaun, Managing Director of VÖZ
- Jan Deja, Chief Executive of Polish Cement Association.
- Edwin Vermeulen, Secretary Sector Cement of Cement & Beton Centrum.

## II. MEMBERSHIP AND PARTNERSHIP SITUATION

At the end of 2019, EUPAVE had 21 members from 11 countries (11 Full Members and 10 Associate Members) and 15 Partners.

In 2019; Roos Groep joined EUPAVE as Partner of EUPAVE.

Members	Type of membership
Betonsuisse Marketing AG	Full
CEMBUREAU- European Cement Association	Full
Cement&Beton Centrum- Dutch Cement & Concrete Centre	Full
CIMBéton- Information Centre on Cement and its Applications	Full
FEBELCEM- Belgian Cement Association	Full
GOMACO	Full
LafargeHolcim	Full
InformationsZentrum Beton GmbH	Full
Oficemen- Spanish Cement Association	Full
Polish Cement Association	Full
VOEZ- Association of the Austrian Cement Industry	Full

*Table 1: EUPAVE Full Members situation end 2019*

Members	Type of membership
Britpave	Associate
CEMEX	Associate
Deltabloc International GmbH	Associate
ERMCO- European Ready Mix Concrete Association	Associate
Givasa	Associate
Gütegemeinschaft Betonschutzwand & Gleitformbau e.V.	Associate
Guntert & Zimmerman	Associate
Power Curbers Inc.	Associate
Turkish Cement Manufacturers' Association	Associate
WIRTGEN GmbH	Associate

*Table 2: EUPAVE Associate Members situation end 2019*

Partners	
AB-Roads	Partner
Carlos Jofré	Partner
Chem-Crete	Partner
Haitsma Beton	Partner
KWS Infra B.v.	Partner
Otto Alte-Teigeler GmbH	Partner
Otto Brentzel	Partner
RISE CBI	Partner
Robuco	Partner
Roos Groep	Partner
Sepehr Ghafari	Partner
SPECBEA	Partner
TRBA	Partner
Zeta Industry	Partner
ZBS	Partner

*Table 3: EUPAVE Partners situation end 2019*

# III. ACTIVITIES

## a. Website

EUPAVE released its new website on 1 December 2017.

18 articles were posted on the website in 2019 as well as publications, leaflets and a position paper.



[www.eupave.eu](http://www.eupave.eu)



## b. Newsletter

EUPAVE published 6 newsletters in 2019

- Newsletter 21 February 2019
- Newsletter 23 April 2019 (invitation to EUPAVE Best Practices workshop)
- Newsletter 9 May 2019
- Newsletter 3 July 2019
- Newsletter 25 September 2019
- Newsletter 29 November 2019

Newsletter	Recipients	Unique opens	Bounced	Unsubscribed	Clicked
EUPAVE Newsletter, 21 February	1254	347 (28,36%)	27 (2,15% couldn't be delivered)	32 (2,61%)	108 (31,12%)
EUPAVE Invitation to workshop, 23 April	1234	362 (30,5%)	24 (1,94% couldn't be delivered)	37 (3,06%)	101 (27,9%)
EUPAVE Newsletter, 9 May 2019	1224	362 (30,99%)	30 (2,45% couldn't be delivered)	5 (0,42%)	119 (32,78%)
EUPAVE Newsletter, 3 July 2019	1239	362 (30,76%)	62 (5% couldn't delivered)	3 (0,25%)	99 (27,35%)
EUPAVE Newsletter, 25 September 2019	1231	320 (27,26%)	57 (4,63% couldn't delivered)	6 (0,51%)	102 (31,88%)
EUPAVE Newsletter, 29 November 2019	1232	322 (27,29%)	52 (4,22%)	1 (0,08%)	97 (30,12%)

### Definition from [Campaign Monitor](#):

Unique opens: "One open is recorded for each individual recipient who opens the campaign."

Bounced: "Bounced emails are the number of email addresses that returned a soft or hard bounce. Below that is the percentage of emails sent that could not be delivered, because they bounced."

Unsubscribed: "This is the total number of recipients who clicked the unsubscribe link in your campaign. The percentage is calculated as the number of people who opted out compared to the total number of emails sent."

Clicked: "The percentage displayed next to "clicked a link" is the total number of people who clicked a link (one or more links, one or more times), divided by the number of unique opens."



### c. Intranet

The intranet has been updated regularly in 2019.

The new intranet included in the new website was developed over December 2017.

The following information and documents are available through the intranet for EUPAVE Members:

#### **Calendar of EUPAVE meetings and events**

##### **EUPAVE documents**

Activity plan, updated after each meeting

Annual reports, from 2009 until 2018

Membership Action Plan, updated after each Board meeting

Bylaws

##### **Meetings documents**

Including the meetings' documents from 2016 until now

Including the "issue trackers" on EU political affairs, updated for each Board meeting

##### **Working Groups**

Best Practices WG

EU Advocacy WG

Concrete Safety Barriers WG

Communication Tools WG

Environmental Strategy WG

Concrete Pavement Statistics WG

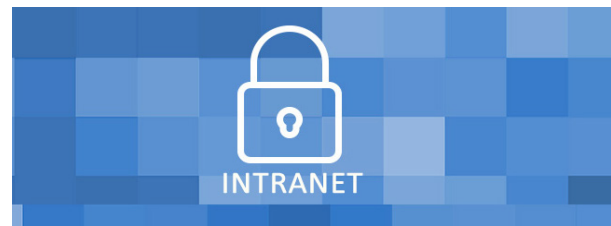
*Including the agenda and/or presentation of each teleconference*

##### **Workshop**

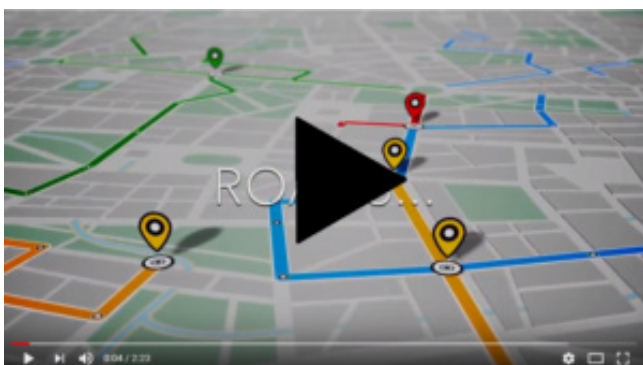
Documents of past workshops

##### **EUPAVE publications**

##### **Replies to EC Consultations**



### d. Video



EUPAVE's promotional video was released during the Opening Session of the 13th International Symposium on Concrete Roads held Wednesday 19 June 2018. Since then, it has been viewed more than 750 times.

## e. EUPAVE Publications



### Roller compacted concrete: making concrete pavements available to the whole pavement building industry

The advantages of conventional vibrated concrete pavements are well known: strength, anti-skidding properties, luminosity, fire resistance, durability, reduction of fuel consumption, minimal maintenance, more economical than other options in the long term. However, in most cases they must be constructed with machinery only suitable for concrete paving. Although present all around the world, the number of machines for mechanised construction of concrete pavements is largely exceeded by those used for asphalt paving, mainly finishers and rollers. Roller Compacted Concrete (RCC) is a hybrid technique allowing the use of asphalt equipment to achieve a pavement building properties (strength, durability) similar to those of vibrated concrete pavements. Although primarily intended for low speed applications such as industrial yards or secondary and residential roads, progress in machinery and construction methods along near 50 years of experience have expanded the use of RCC pavements for carriageways with higher traffic volume. Currently, for most applications where vibrated concrete pavements are used, RCC is also a feasible option providing excellent results.



June 2019 - EUPAVE released new publication **“Roller compacted concrete: making concrete pavements available to the whole pavement building industry”** during the 4th workshop on Best Practices in Concrete Paving organised Tuesday 18 June 2019.

It includes an explanation of what is RCC, where and when to use the technique, its advantages and potential limitations and more.



August 2019 - EUPAVE released its infographic **“Concrete Pavements Make Road More Sustainable”**.

The new working group on Environmental Strategy has developed an infographic showing the environmental benefits of concrete pavement.

The infographic was officially released during the EU Event of 11 December 2019.



### Vehicle Restraint Systems on the A55 and A483 Trunk Roads

Whole Life Cycle Cost Benefit Analysis

John Elystan Richards BSc (Hons) BEng (Hons)



September 2019 - EUPAVE released the publication **“Vehicle Restraint Systems on the A55 and A483 Trunk Roads”**.

This publication is a study presented by John Elystan Richards during EUPAVE’s Concrete Safety Barriers workshop on Friday, 2nd March 2018. Following a strong interest in the topic, EUPAVE decided to share this study as a EUPAVE publication.

## f. EUPAVE Events

28 January - 1 February 2019

### Visit of Japanese delegation to Belgian continuously reinforced concrete pavements (CRCP)

A Japanese delegation visited Belgium from 28 January until 1st February 2019 with the aim to learn and exchange experiences in the field of continuously reinforced concrete pavements (CRCP).

The 13 guests coming from the Japanese Cement Association, Ishikawa National College of Technology, the East Nippon Expressway Co. and its Research Institute, Taisei Rotec Co. and Oriental Consultants were welcomed by EUPAVE, FEBELCEM (Federation of the Belgian Cement Industry), the BRRC (Belgian Road Research Centre) and AB-Roads.

The first day of the visit, Tuesday 29 January 2019, took place in the Belgian Road Research Centre where they were welcomed by Mrs. Annick De Swaef, director-general of the BRRC, Mr. Etienne Scherpereel, vice-president of the BRRC and Mr. Claude Van Rooten, President of PIARC, the World Road Association. Several presentations were on the agenda:

Luc Rens (EUPAVE/FEBELCEM) started with the history of CRCP and also explained the maintenance and repair techniques.

Elia Boonen (BRRC) introduced the basic principles and standard technical specifications for design and construction of CRCP in Belgium

Anne Beeldens (AB-Roads) presented the special applications of CRCP, such as roundabouts and tramways and also highlighted a special case of distress which is the phenomenon of horizontal cracking.

Pieter De Winne, head of the Road Engineering Division of the Flemish Road Authorities presented his organization and explained the reasons for choosing CRCP on the most intensely trafficked part of the motorway network.

Subsequently, Mr. Nishizawa, professor at the Ishikawa National College of Technology presented the Japanese experiences and practices in concrete road construction.

In the late afternoon, the participants were invited to visit a nearby site in Steenokkerzeel with a bypass road and roundabout, built in 2003, both in CRCP.

On the next day, Wednesday 30 January, the delegation was invited in FEBELCEM and EUPAVE premises where they received a presentation of the worksite of Couvin by Mrs. Nathalie Balfroid. In the afternoon, they visited the motorway E40, 48 years in service now, as well as some rural roads in jointed concrete and in CRCP. In the evening, Belgian and Japanese delegates were invited by the BRRC to share a dinner at the restaurant Samouraï in Brussels city center.

On their last day, Luc Rens guided the group to different CRCP sites in Flanders, mainly motorways (E40 Brussels – Ostend; E17 Gent – Kortrijk; A11 Gent-Antwerp; R1 Ring of Antwerp; A12 Antwerp-Brussels).

A final visit was scheduled to the Nieuwelaan in Meise, a remarkable road in jointed concrete slabs, built in 1952.

Exchanging experiences and visiting projects are excellent ways to learn how design rules and construction practices are related to the behavior of road pavements. It was a pleasure for EUPAVE to contribute to the exchange with the Japanese colleagues. We also thank the BRRC, FEBELCEM, AB-Roads, TRBA and the Flemish and Walloon Road Authorities for the fine collaboration in hosting this visit.



## f. EUPAVE Events

18 June 2019

### Impressive testimonials on RCC at EUPAVE's workshop on Best Practices 1/2

On Tuesday 18th June, EUPAVE held at the Thon Hotel EU in Brussels its 4th workshop on Best Practices in Concrete Paving. The theme for this year was “Hydraulically Bound Base Layers & Roller Compacted Concrete Pavements”. Attended by around 35 participants, the workshop gathered experts who have an interest in RCC in particular

During this event various topics were discussed over the day starting with hydraulically bound base layers, a general introduction on Roller Compacted Concrete (RCC) and the promotion of RCC across Europe. The situation of RCC in Turkey and the market of RCC in the U.S were also presented.

Each participant received a copy of EUPAVE's new publication “Roller compacted concrete: making concrete pavements available to the whole pavement building industry”. You can find here the publication.

Mr. Stéphane Nicoud, president of EUPAVE, opened the workshop on behalf of its vice-president, Rory Keogh. He welcomed the attendees and thanked them for their presence.

Mr. Nicoud gave a special welcome to EUPAVE members and partners and introduced EUPAVE's working groups on Best Practices, Concrete Safety Barriers, Environmental Strategy, EU Advocacy and Communication strategy. He also informed the participants about EUPAVE's newsletter and different affiliations. He finished his introduction by an overview of the previous workshops on Best Practices organised since 2015.

Mrs. Colette Grégoire, Senior Researcher at the Belgian Road Research Center (BRRC) gave a presentation on the “standards, materials and tests methods” of Hydraulically Bound Base Layers.

Mr. Luc Rens, managing director of EUPAVE, presented the “design, construction and performances” of Hydraulically Bound Base Layers. His presentation

focused on the choice of base layer, the different types of HBBL, the construction techniques and ended by final considerations such as the circular economy and climate-resilience.

Mr. Carlos Jofré, consultant, gave a general introduction on Roller Compacted Concrete Pavements. Mr. Jofré explained in which cases using RCC pavements is interesting and where to use them. He went back on the market of RCC pavements and gave some technical information.

Mr. Mathew Tranter from Cemex UK and Mr. José M. Merino, from Cemex Spain highlighted the RCC promotion across Europe.

Following the coffee break, Mr. Ozgur Yaman presented the RCC pavements in Turkey. Mr. Yaman showed the different applications in Turkey and what lessons have been learned regarding the construction of the roads.

Mrs. Anne Beeldens, consultant at AB-Roads, gave a presentation on behalf of Corey Zollinger, Director Paving Solution at Cemex and Chairman of RCC Pavement Council, on the market of RCC pavements in the U.S.

An open discussion followed the presentations.





## Impressive testimonials on RCC at EUPAVE's workshop on Best Practices 2/2

Finally Stéphane Nicoud drew the main conclusions of the workshop:

Hydraulically Bound Base Layers are a good solution for all types of pavements  
Several types are available depending on the design parameters,  
The preliminary design study is a good start,  
The resistance to erosion can be more important than just strength  
They fit in the framework of “circular economy” and “climate resilience”.

RCC pavements are increasingly applied all over the world:

Equipment are widely available,  
Properties are similar to conventional concrete,  
Mainly for low speed applications,  
Further developments in surface finishing are ongoing,  
A good way to get started with concrete pavements.  
The workshop was followed by a cocktail at the hotel restaurant.



12 September 2019

## **Well attended FEBELCEM/EUPAVE workshop on “Two-layer concrete pavements” at MATEXPO 2019**

The Federation of the Belgian Cement Industry, FEBELCEM, and the European Concrete Paving Association, EUPAVE organised on 12 September 2019 a joint workshop on “Two-layer concrete pavements” at MATEXPO 2019, Kortrijk.

MATEXPO is a biennial international trade fair for building equipment at Kortrijk Xpo. As the third largest trade fair of its type in Europe, it has an established reputation and receives more than 40,000 visitors.

Mr. Wim Kramer from Cement&Beton Centrum (Netherlands) and Chairman of EUPAVE’s Best Practices Working Group, opened the workshop and introduced EUPAVE and the speakers to the 70 participants.

The first presentation was given by Luc Rens from EUPAVE and FEBELCEM on “Two-layer concrete pavements for motorways and public spaces”. Mr. Rens gave a general introduction on what two-lift concrete pavement (2LCP) is, why using it and its benefits. He also presented 3 cases of decorative concrete pavements and gave examples of highways/motorways in two-layered JPCP and CRCP.

Mr. Martin Datzert from WIRTGEN (Germany) then introduced the “German experience on two-layer concrete for motorways”. Mr. Datzert started by explaining the different paving technologies and focused on dual layer paving with two different concrete mixes.

Mr. Filip Covemaeker, TRBA, gave a case study of the bypass road of Couvin E420/N5. Mr. Covemaeker showed a presentation video of the company TRBA and informed the participants on the project, the equipment used and the quality and benefits of using such technique.

Afterwards, at the outdoor exhibition, the audience visited the stands of De Bruycker-Kemp and Wirtgen where slipform pavers from Gomaco and Wirtgen were presented.

The workshop and visit ended with a walking lunch organised by MATEXPO.

We wish to thank one more time our speakers for their great contribution and the MATEXPO team for the opportunity of organising this event.



7 October 2019

## **Successful EUPAVE workshop on “Long-Life and Circular Concrete Pavements for Sustainable Cities and Regions”, PIARC XXVth World Road Congress**

The European Concrete Paving Association, EUPAVE organised on 7th October 2019 a workshop on “Long-Life and Circular Concrete Pavements for Sustainable Cities and Regions” during the PIARC XXVth World Road Congress in Abu Dhabi. Since the first edition, held in Paris in 1908, PIARC (World Road Association) organises every four years in a member country a World Road Congress with the aim to share techniques and experiences worldwide in the field of road infrastructures and road transport.

André Jasienski from FEBELCEM (Belgium) opened the workshop and introduced EUPAVE to the 115 participants.

The first presentation was given by Tim Alte-Teigeler from Otto Alte-Teigeler GmbH (Germany) on “Concrete pavement preservation techniques”. He gave more insight in the techniques of slab lifting and cross stitching as well as the full depth repair of concrete slabs using ultra-fast hardening concrete mixes.

Luc Rens continued with “Concrete surface restoration techniques”, mainly surface milling, grinding and the promising “Next Generation Concrete Surface”.

André Jasienski talked about his 40 years of experience in concrete paving, starting with a PIARC experimental road section in 1979. He emphasised the importance of a good drainage system, a non-erodible base layer, the use of an asphalt interlayer and dowels in order to obtain a long-life performing jointed concrete pavement.

Özgür Yaman from the Turkish Cement Manufacturers’ Association (Turkey) presented “the challenge of starting with concrete roads – first experiences with jointed plain and roller compacted concrete pavements”. The fact that RCC pavements can be built using asphalt finishers and roller compactors, thus currently available equipment, is one of the main reasons for the amazing growth and development in a few years time.

Anne-Séverine Poupeleer, Member of PIARC TC A1, Head of division for the Flemish Road Authorities AWW (Belgium) showed a diversity of sustainable applications for concrete pavements, “from public spaces to peak hour lanes”. In a radius of only 25 km from her office, she presented a wide range of concrete pavements, built during the past 50 years: motorways in CRCP, airport pavements, cycle paths, walking paths in a park, urban streets and the development of a hospital area.

Then, Thierry Sedran, IFSTTAR (France) introduced the “Removable Urban Pavements”, an innovative system of hexagonal slabs. It allows easily removing and reinstalling the pavement when utilities in urban areas need replacement. The system had recently been improved for better load transfer in case of heavy traffic. This type of reusable modular elements is a great example of circular construction principles.

A lively Q&A session followed the presentations and finally Luc Rens drew the conclusions and closed the workshop.





11 December 2019

## **Fruitful discussion at EUPAVE Debate “Sustainable roads towards 2050 carbon neutrality” 1/2**

On Wednesday 11 December EUPAVE and MEP Inma Rodríguez-Piñero held a Debate on “Sustainable roads towards 2050 carbon neutrality” at the European Parliament. Wednesday 11 December also marks the day of the Green Deal’s release.

MEP Inma Rodríguez-Piñero has been a Member of the European Parliament since the 2014 European elections. She has since been serving on the Committee on International Trade and as a substitute member on the Committee on Transport and Tourism. She is also a member of the parliament’s delegation to the EU-Chile Joint Parliamentary Committee.

In addition to her committee assignments, Rodríguez-Piñero is a member of the European Parliament Intergroup on Long-Term Investment and Reindustrialization.

Mrs. Inma Rodríguez-Piñero, Member of the European Parliament, and Mr. Stéphane Nicoud, President of EUPAVE, opened the event attended by 36 participants. Mr. Luc Rens, Managing Director of EUPAVE, moderated the event.

The debate was also the occasion to release EUPAVE’s infographic on “Concrete Pavements make roads more sustainable”.

### Welcome words

MEP Inma Rodríguez-Piñero highlighted the relevance of the road infrastructure to decarbonize the transport sector. She asked EUPAVE to enlarge the discussion in 2020 with more MEPs since she considers this debate as extremely useful. She was also vocal about the need for EUPAVE to make its voice stronger and her need of more concrete cases and cost elements on the solutions advocated by the association.

Stéphane Nicoud added some words on EUPAVE’s

missions and commitment to promote and defend the contribution of concrete to road safety, fuel consumption, traffic jams reduction and sustainable construction.

He reminded the release of the European Green Deal and its proposal adopted by the Commission indicating ambitious targets like the “shifting to smart and safe zero-emission mobility with the future possibility of including road transport emissions in the Emission Trade System to complement existing and future strengthened CO2 emission performance standards for vehicles”.

Koen Coppenhelle, chief executive of Cembureau, introduced the cement industry’s “5 C” approach including:

- Carbonation
- Clinker
- Cement
- Concrete
- Construction

Nicolas Miravalls, chairman of EUPAVE’s WG on Environmental Strategy, gave a presentation on “trends towards sustainability for road construction in Europe”. He reminded the need to accelerate in order to meet the 2050 milestones and the necessity of procurement rules to evolve towards measurement, control, predictability, ...

Mohen Ech, head of innovation for mining and roads business at LafargeHolcim presented a “Showcase on Road Carbon impact variations” illustrated with a case study. He concluded his presentation highlighting the importance to switch construction of European highways from flexible to rigid structure to contribute in GWP reduction but also to offer higher resilience to climate change and to severe loading conditions.

## Fruitful discussion at EUPAVE Debate “Sustainable roads towards 2050 carbon neutrality” 2/2

Finally, Mr. Iñigo Urresti, Deputy Head of Unit of Unit C1 (Clean Technologies and Products) from DG GROW (European Commission) introduced the “Industrial Policy and Sustainable Built Environment Strategy in the context of the Green Deal”. Mr Urresti stressed that, with the launching of the European Green Deal, the long-life cycle assessment will gain momentum in the EU policy on building and infrastructure including the green public procurement. He recalled that a study on low transport maintenance is underway in his department and encouraged EUPAVE to seize all the opportunities of the green deal.

Stéphane Nicoud highlighted the fact that when policy-makers address the road issues, they tend to forget infrastructure as part of the solution. Thus, most of the measures focus on improving vehicles, “at EUPAVE we believe that infrastructure and pavement are a key lever to achieve green mobility in Europe and that we need more competition between pavement industries within a public procurement that takes a long term view of costs and environmental impacts. We hope the Green Deal will give a big push in this direction”.

A Q&A moderated by Luc Rens, Managing Director of EUPAVE followed the presentations before Ms. Inma Rodríguez-Piñero, MEP (S&D) and Mr. Stéphane Nicoud, President of EUPAVE concluded the event.



11 December 2019

### **EUPAVE Christmas Dinner 2019 on what the future holds for EUPAVE!**

EUPAVE celebrated its traditional Christmas dinner debate on Wednesday 11 December 2019 at La Maison du Luxembourg, Brussels.

The dinner was this year focused on the results of EUPAVE's satisfaction survey circulated within members and partners ahead of the event. Participants gave input and ideas on how to improve and develop EUPAVE in the next years. Only Partners and Members of EUPAVE were invited to debate on the question.

The dinner was also the occasion to thank Mr. André Jasienski, Managing Director of FEBELCEM, for his work for the association and to wish him a good retirement.





## g. EUPAVE Webinars

7 February 2019

### Circular economy in practice – EUPAVE's first webinar on the use of recycled concrete aggregates

On 7 February 2019, EUPAVE held its first webinar with theme "Concrete Pavement Recycling and the Use of Recycled Concrete Aggregates in Concrete Paving Mixtures". The online meeting was attended by around 20 participants, all from EUPAVE Members and Partners.

Mr. Mark Snyder, Pavement Engineering and Research Consultant, was invited to give a presentation based on his wide experience and several publications he wrote on the topic.

The webinar started with introductory words from Luc Rens, EUPAVE Managing Director.

Mr. Rens announced the continued wish for EUPAVE to keep on putting sustainability aspects high on the agenda in 2019. Indeed, a new working group on Environmental Strategy will soon be launched and be opened to the association's members. He reminded that "recycling" is still a hot topic, particularly in the framework of the circular economy.

Different EUPAVE publications linked to sustainability and circular economy have already been released over the years:

- September 2009: Concrete roads: a smart and sustainable choice
- November 2015: Concrete Roads – An integral part of the circular economy (position paper)
- December 2018: Tendering for sustainable infrastructure in the circular economy (position paper)

Dr. Mark Snyder then gave his presentation on

"concrete paving recycling and the use of recycled concrete aggregates (RCA) in concrete paving mixtures".

He started with an overview of the use of RCA in the U.S. Concrete recycling can be considered as a proven technology as the use of RCA is allowed in at least 43 of 50 states. The main reasons for concrete recycling are both cost savings (elimination of excavation, reduced purchase and haul of natural aggregate, avoided haul fuel consumption...) and environmental benefits (landfill reduction, conservation of resources,...).

From the properties of RCA he moved to the properties of fresh and hardened concrete with RCA and the effects of RCA and mix design on strength, thermal properties and durability. Subsequently the performances of RCA concrete pavements were presented including several interesting case studies, most of them success stories but also some that failed. An interesting part of the presentation was about the rehabilitation techniques such as diamond grinding and dowel bar retrofit, to restore the driving comfort of old concrete roads and allowing them to be in use beyond their design service life.

Some examples of RCA in two-lift pavements were shown amongst which the impressive Illinois Tollway project (I90 – 2014). Dr. Snyder ended with recommendations for mix design and some useful pavement structural design considerations.

The presentations were followed by a Q&A. EUPAVE wants to express its gratitude to Dr. Snyder for the outstanding presentation and friendly collaboration.



5 June 2019

## **EUPAVE Webinar “Sustainability Assessment of Infrastructure”**

Following the growing interest of sustainability assessments for infrastructure projects, Mr. Ian Nicholson , Director CEEQUAL and Infrastructure, BRE, gave a general introduction followed by specific information on the CEEQUAL scheme.

The presentation was followed by 20-minutes Q&A.



**EUPAVE**  
EUROPEAN CONCRETE PAVING ASSOCIATION  
**INVITATION**

*Join us for  
a fruitful  
discussion!*

**WEBINAR**

**SUSTAINABILITY ASSESSMENT OF  
INFRASTRUCTURE**

Wednesday 5 June 2019 from 16.00 till 17.00

**CEEQUAL**  
delivered by **BRE**

Presented by Ian Nicholson,  
Director CEEQUAL & Infrastructure, BRE

Following the growing interest of sustainability assessments for infrastructure projects, Mr. Ian Nicholson will give a general introduction followed by specific information on the CEEQUAL scheme.

The presentation will be followed by 20-minutes Q&A.

**THE WEBINAR IS FREE FOR ALL EUPAVE MEMBERS AND PARTNERS.  
DO NOT HESITATE TO INVITE YOUR COLLEAGUES AND EXTERNAL  
COLLABORATORS.**

**REGISTER AT [E.CARABEDIAN@EUPAVE.EU](mailto:E.CARABEDIAN@EUPAVE.EU) BY 5 JUNE 2019 AT 12.00**

## ISCP/ACPA Webinar serie, 2018-2019

EUPAVE also invited its Members and Partners to follow ISCP/ACPA Webinar serie for free.

# 2018-2019

## WEBINAR SERIES: CONCRETE PAVEMENT TOPICS

**FREE REGISTRATION:**  
ISCP Members, Government Employees, & Students:  
I Become an ISCP Member:  
[www.concretepavements.org](http://www.concretepavements.org)

**2 Webinar Registration:**  
Go to ISCP website, login, then click on the direct webinar link:  
[www.concretepavements.org/webinars2018-19](http://www.concretepavements.org/webinars2018-19)

**ACPA MEMBER REGISTRATION:**  
#1-8 (90 minutes):  
Individual: \$ 30 ACPA Members  
\$ 50 Non-Members  
Group: \$ 75 ACPA Members

**Spanish (6) Webinar:**  
Individual: \$ 20 ACPA Members  
\$ 50 ACPA Members  
Group: \$ 75 ACPA Members


**Webinar Registration:**  
(see FREE REGISTRATION instructions in green box at left)  
[www.acpa.org/upcoming-webinars-meganars-and-workshops/](http://www.acpa.org/upcoming-webinars-meganars-and-workshops/)

**8 Planned Webinars**  
presented by  
**ISCP**  
in cooperation with  
**ACPA**  
All Webinars are **FREE**  
for **ISCP Members**  
(see FREE REGISTRATION instructions in green box at left)

**6 ISCP/ACPA SPANISH Webinars:**  
[www.concretepavements.org](http://www.concretepavements.org)

**QUESTIONS?**  
**Jeff Roesler,**  
President-ISCP  
E-mail: [jroesler@illinois.edu](mailto:jroesler@illinois.edu)  
or  
**Bill Davenport**  
ACPA  
E-mail: [bdavenport@acpa.org](mailto:bdavenport@acpa.org)  
Phone: 847-423-8703

**PDH Credits**  
ACPA will award a certificate of completion for each webinar. Each webinar will award 1.5 professional credit and/or 1 to 1.5 professional development hours.




	DATE	TIME	TOPIC
1	OCTOBER 25, 2018	THURSDAY 12:00 TO 13:30 CST / 17:00-18:30 UTC	<b>Pervious Concrete Pavement</b> <ul style="list-style-type: none"> <li>• Overview, Design and Material Requirements <b>Somayeh Nassiri</b>, Asst. Professor-Washington State University &amp; Director-ISCP</li> <li>• Construction Practices <b>Andrew Marks</b>, Managing Director-Puget Sound Concrete Specification Council</li> </ul>
2	DECEMBER 6, 2018	THURSDAY 12:00 TO 13:30 CST / 18:00-19:30 UTC	<b>Life Cycle Cost Analysis for Concrete Pavements</b> <ul style="list-style-type: none"> <li>• LCCA principles and use for design and project selection in U.S./Latin America <b>Jim Mack</b>, Director-Market Development-CEMEX</li> <li>• Australian approach to LCCA for PCC pavement decision-making <b>Justin Moss</b>, Asso. Tech. Director &amp; Team Leader-Arcadis &amp; Director-ISCP</li> </ul>
3	FEBRUARY 28, 2019	THURSDAY 12:00 TO 13:30 CST / 18:00-19:30 UTC	<b>Internal Curing for Concrete Pavement</b> <ul style="list-style-type: none"> <li>• Basic Mechanisms, Tests, and Research Overview <b>Armen Amirghanian</b>, Asst. Professor-University of Alabama &amp; Director-ISCP</li> <li>• Overview of selected projects utilizing IC for concrete pavement <b>Jeff Roesler</b>, Professor-University of Illinois &amp; President-ISCP</li> </ul>
4	MARCH 28, 2019	THURSDAY 10:00 TO 11:30 CST / 15:00-16:30 UTC	<b>Roller Compacted Concrete Pavement</b> <ul style="list-style-type: none"> <li>• Design and Material Requirements <b>Corey Zollinger</b>, Director-CEMEX &amp; Secretary-Treasurer-ISCP</li> <li>• Best practices: Field, Design, Construction and Performance <b>Tim Smith</b>, Director-Englobe &amp; Director-ISCP</li> </ul>
5	APRIL 25, 2019	THURSDAY 12:00 TO 13:30 CST / 17:00-18:30 UTC	<b>Alkali-Silica-Reaction (ASR) Potential for Concrete Pavement Damage: Background, Prevention Measures, and Repair</b> <ul style="list-style-type: none"> <li>• The basics of ASR, conditions in Concrete Pavements, and current approaches to prevent such damages in pavements <b>Ing. Rolf Breitenbücher</b>, Professor-Ruhr-Universität Bochum &amp; Director-ISCP</li> </ul>
6	MAY 30, 2019	THURSDAY 12:00 TO 13:30 CST / 17:00-18:30 UTC	<b>Fiber-Reinforced Concrete Pavements</b> <ul style="list-style-type: none"> <li>• Fiber Types, Test Methods, Slab Performance, and Construction <b>Jeff Roesler</b>, Professor-University of Illinois &amp; President-ISCP</li> <li>• Case studies of different types of FRC pavement projects <b>Juan Pablo Covarrubias</b>, Dir.-TCPavements &amp; Director-ISCP</li> </ul>
7	JUNE 27, 2019	THURSDAY 12:00 TO 13:30 CST / 17:00-18:30 UTC	<b>Joint Durability and Repair</b> <ul style="list-style-type: none"> <li>• Overview of early-age deterioration, best practices for prevention and restoration <b>Peter Taylor</b>, Director-CP Tech Center &amp; Director-ISCP</li> <li>• Implementation and long-term performance of partial-depth repair and other PCC preservation methods <b>Tom Burnham</b>, Sr. Road Research Engineer-MnDOT &amp; Director-ISCP</li> </ul>
8	AUGUST 22, 2019	THURSDAY 12:00 TO 13:30 CST / 17:00-18:30 UTC	<b>Life Cycle Assessment for Concrete Pavements</b> <ul style="list-style-type: none"> <li>• Overview of LCA models for concrete pavements <b>Eric Ferrebee</b>, Technical Services Engineer-ACPA</li> <li>• Pavement LCA-based packages that measure environmental impact of Canadian and US road designs <b>Tim Smith</b>, Director-Englobe &amp; Director-ISCP</li> </ul>

## IV. REPRESENTATION

Month	Day	Activity
March	26	FEHLR Firm 19 (Luc Rens)
April	4	ERTRAC Annual Conference (Elise Carabedian)
	11	Bauma, Munich, Germany (Luc Rens)
June	4	ERF Plenary Assembly (Luc Rens)
July	3	Construction 2020- Amanac workshop (Luc Rens)
	3	ERTRAC Plenary (Elise Carabedian)
	4-5	Visit of Chinese delegation to motorway A7, Mond, Belgium (Luc Rens)
September	26-27	German Concrete Roads Conference, Aschaffembourg, Germany (Luc Rens)
October	6-10	World Road Congress, Abu Dhabi (Luc Rens)
November	13-14	TCMA National Event, Ankara, Turkey (Luc Rens)



## Collaboration with stakeholders - in details

### ISCP (International Society for Concrete Pavements°)

Mr. Luc Rens continued in 2019 his position as a Director of the Board in ISCP and participated in the conference calls of the Board Meeting.



### PIARC (World Road Association)

In 2019, Luc Rens participated as corresponding member in the Technical Committee E2 “Environment considerations in road projects and operations”.



### ERF (European Road Federation)

EUPAVE continued membership of the European Union Road Federation and participated in in the ERF working groups as well as other activities:



→ ERF Plenary Assembly; Luc Rens participated in the ERF Plenary Assembly of 4 June 2019

→ Luc Rens participated in the ERF WG on Road Restraint Systems meeting of 21 March, 26 June and 17 December 2019

### European Parliament

EUPAVE continued its regular contacts with Members of the European Parliament and hosted an event the 11 December 2019 (see EU Event).



### ERTRAC (European Road Transport Research Advisory Council)

EUPAVE remained a member of ERTRAC in 2019.

Elise Carabedian participated in ERTRAC Annual Conference the 4 April 2019 and ERTRAC Plenary meeting the 3 July 2019.



## V. INTERNAL ORGANISATION

EUPAVE bodies had several meetings in 2019 in order to continue the work and progress in the internal organisation, to set out the strategy and decide on different forms of promotion, events and seminars. The Technical and Promotion Committee, EU Advocacy Working Group (WG), Best Practices WG and Concrete Safety Barriers WG serve as advisory body for the Board of Directors.

One ordinary General Assembly was held on 19 June 2019 in Brussels.

### **Four Board meetings were organised on:**

- 7 March 2019
- 19 June 2019
- 16 October 2019
- 12 December 2019

### **Four Technical and Promotion Committee meetings were held on:**

- 7 March 2019
- 19 June 2019
- 16 October 2019
- 12 December 2019

### **Working Groups**

#### **One EU Advocacy WG tele-conference was held on:**

- 25 February 2019

#### **Four Best Practices WG tele-conferences were held on:**

- 15 March 2019
- 21 March 2019
- 25 October 2019
- 9 December 2019

#### **Two Concrete Safety Barriers WG tele-conferences were held on:**

- 20 August 2019
- 20 March 2019

#### **Nineteen Environmental Strategy WG teleconferences were held on:**

- 11 March 2019
- 26 April 2019
- 14 May 2019
- 29 May 2019
- 3 June 2019

- 21 June 2019
- 1 July 2019
- 9 July 2019
- 16 July 2019
- 25 July 2019
- 4 September 2019
- 11 September 2019
- 13 September 2019
- 23 September 2019
- 22 October 2019
- 31 October 2019
- 14 November 2019
- 20 November 2019
- 2 December 2019

#### **Five Concrete Pavement Statistics WG teleconferences were held on:**

- 2 September 2019
- 16 September 2019
- 9 October 2019
- 12 November 2019
- 2 December 2019



