

eye



KEEPING YOU UP TO DATE ON AUTOMATIC VEHICLE DETECTION AND CLASSIFICATION TECHNOLOGY

www.idris-technology.com



New-look Idris Eye

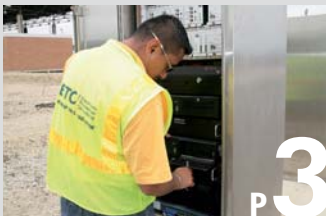
To coincide with the launch of our new website, this month heralds the new-look Eye. We're sure you'll agree its as 'Eye'-catching as ever!

IN THIS EDITION

Incident Detection - the story so far

Idris Community updates for ITPs

A thought on tolling - Managing Director, Bob Lees



P 3

Miami-Dade convert with ETC Corporation

ITP logo for 2009



P 4

E-470's cashless alternative

IBTTA meeting in Denver

Pulling it all together

Filed earlier this month was 'The Surface Transportation Authorization Act of 2009'. The aim is to introduce interoperability for toll collection devices in the USA and within 18 months of this Bill passing to have established a standard for such interoperability, and within two years of this for all toll facilities on the National Highways System to adopt these standards.

This opens up a whole new world of conversation for the next IBTTA meeting, but before then Dr Hal Worrall of Transport Innovations gives his view on the matter.

"This may serve to boost our desire to have national interoperability on the technical level but some thought should now be given to how we set up a national registry for those who wish to travel across state lines on a regular basis. It is always the legal contractual and procedural (business rules) which make the process really work. Europe is a great example. This is the reason we started with an ETC framework in South Africa that dealt with the legal, contractual and business rules of the various concessions before defining the Gauteng [Freeway Improvement] project."



Idris spins a new web!

Over the last few months, the DCS team have been busy clearing the cobwebs from the Idris website to bring you a rejuvenated site with superior information and access to Idris Technology.

Contained within its web are past articles, papers & presentations. The case studies have been revised and updated, new press releases and information included. The site also hosts a number of new features, these include, options to sign up for technology and press updates, access to the Q & A area, ability to email information direct to colleagues and simple access to the Idris Technology Partners.

To see for yourself click www.idris-technology.com

We're always interested to hear your views and requirements so please pass on any comments.

www.idris-technology.com



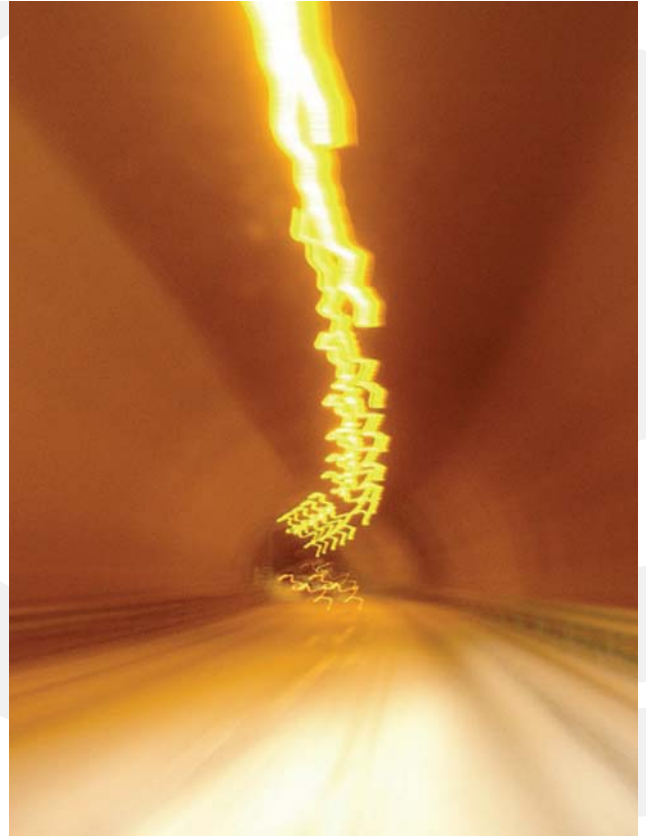
Incident Detection - the story so far

DCS is continuously researching and developing Idris to enhance its capabilities. This enables the software to remain at the forefront of the vehicle detection industry and provide products and systems with the highest levels of accuracy achievable today.

The latest piece of Idris software to undergo a facelift has been the Idris Incident Detection System (IDS). The system tracks vehicles on multi-lane roads and alerts traffic managers in the event of a stopped vehicle or exceptional

incident. This is done entirely with loops below the road surface, avoiding the need for any overhead furniture. Trials have shown the effectiveness of this solution in all traffic conditions and weather scenarios.

The IDS consists of a group of outstations spread along the roadway, each responsible for monitoring a loop site. Various algorithms are used to characterise the traffic and detect anomalies, which trigger alarm messages to a Higher Level System (HLS).



For further information about the new IDS system, contact Teri England teri@diamond.demon.co.uk or go to www.idris-technology.com/technical-sheets/incident-detection/

New Access Area

Idris Community is evolving and now offers more comprehensive access for Users. An ITP exclusive area, with improved security, has been introduced where Idris related downloads, calculation tools and forums are available.

Vital ITP-related information

regarding bug fixes, algorithm releases and updates is also posted onto this ITP section of Idris Community. Technical details such as Idris software, peripheral architecture, detector and processor card lists can be found here, along with revised

information on Idris loop materials and important installation documentation.

ITPs who are not already registered, should log onto: www.idris-community.net and register their details to take advantage of the new features

Idris Community

How do I become part of the Idris Community?

Idris Community is available to persons with an interest or question relating to Idris Technology. There are two levels of access. Non-ITP Users have access to various sections of the site such as 'Question and Answer' forums, case studies and general news relating to Idris. Secure access to technical and proprietary information contained within the ITP sections is only accessible by a registered Idris Technology Partner.

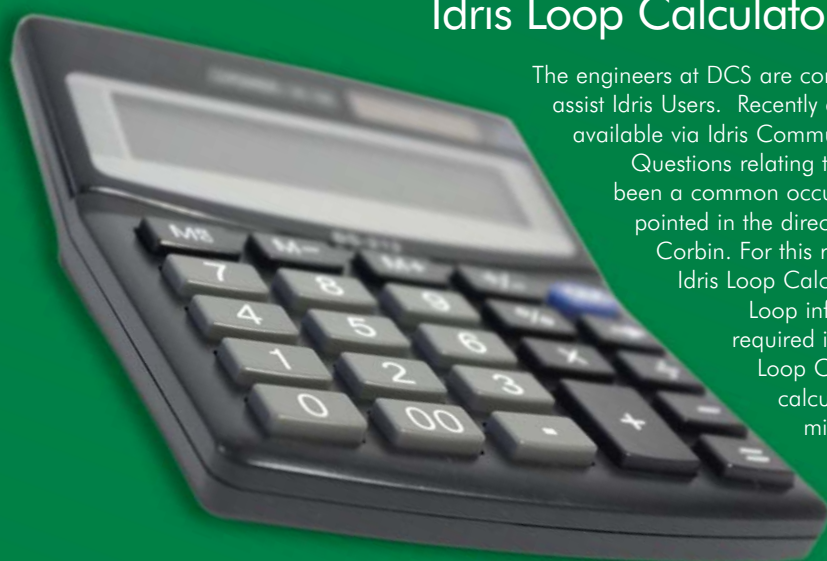
Register now at: www.idris-community.net

Idris Loop Calculator

The engineers at DCS are continually devising ways to assist Idris Users. Recently a new tool has become available via Idris Community.

Questions relating to loop cable lengths have been a common occurrence and are generally pointed in the direction of Idris Engineer, Mark Corbin. For this reason Mark has created the Idris Loop Calculator.

Loop information pertaining to the required installation is fed into the Loop Calculator. From this detail the calculator will supply the minimum cable lengths required per individual main loop and single axle loop for all Idris loop installations.





All-Electronic Fee Collection (AEFC)

from Bob Lees, Managing Director of DCS

Having been involved at the fore-front of a project about to turn on AEFC, Bob offered some food for thought on the matter in an article for *ITS International* recently.

The move to all-electronic fee collection should be encouraging tolling authorities to look again at whether their vehicle classification criteria and technologies remain at all appropriate.

The increasing use of AEFC is resulting in an ever-greater number of tolled facilities from which human participation in the transaction process has been removed.

Free-flowing AEFC is being pursued by many tolling authorities for several reasons all of which make perfect sense: economics, safety and the environment. This move to AEFC takes out of the equation a very useful, and certainly the

most adaptable, detection and classification technology: the Mk.1 Human Eyeball. AEFC makes technology the primary means of classification and thereby hangs the problem; that which the aforesaid Mk.1 Eyeball can detect can be difficult in some cases and outright impossible in others for consistent and reliable automated detection. The key change when moving to AEFC is the shift from technology confirming the operator's classification to technology being the only form of classification.

In transitioning to AEFC from a traditional, barrier-based operation, there is a real need to address two main questions: 'Is my method of classification reasonable?' and 'Can it be measured by electronic means?'

Some parameters, such as the number of axles or a vehicle's height, are readily ascertainable. Others, such as how its rear doors open and close, can be inferred electronically but not necessarily to an adequate degree of accuracy. Dual tyres, often a classification criterion, have long been difficult to discern and are more so in an open-road environment. It is, however, possible to combine some features, such as axle number and vehicle height. It is also possible, though difficult, to accomplish front and rear imaging, classification of some physical characteristics and tag reading from a single gantry. If the classification scheme is to be changed to accommodate AEFC then it would be wise to make the change to the existing system first to avoid major confusion to the customer.

The full article may be found at: www.idris-technology.com/published-articles/dead-reckoning/



update

Miami-Dade Convert with ETC Corporation

An Idris Certified Licensee Company



On March 31, 2009, the Board of Directors of the Miami-Dade Expressway Authority (MDX) unanimously approved the contract award to ETC Corporation to implement a state-wide all-electronic toll collection conversion inclusive of state-of-the-art open road tolling (ORT) roadside systems and a new back-office Account Management and Toll Enforcement System (AMTES).

This multi-phase project is anticipated to be phased in between 2010 and 2013 as various construction and other milestones are met on the five

expressways. Idris AT700 tolling technology is being implemented into the ORT solution, which spans five expressways encompassing approximately 100 lanes across 40 tolling locations. With the addition of this project, ETC Corporation has approximately 350 lanes of ORT either implemented or under contract.

Javier Rodriguez, P.E., Executive Director stated: "The Miami-Dade Expressway Authority's ultimate goal is to keep our community moving towards the future and this project will provide a faster and

safer commute for our customers. ETC Corporation is a leading systems provider with proven experience in delivering and operating the advanced systems required to realize these essential goals."

The Miami-Dade Expressway Authority currently operates 12 toll plazas and 60 toll lanes on its expressways, serving approximately 800,000 users a day. Currently, MDX facilities are equipped with a combination of conventional, electronic, cash and ORT toll collection. All lanes will be converted to ORT under this project.

For more information contact:

ETC Corporation:

Carla Kienast,
Director of Corporate Communications
carla.kienast@etcc.com Tel: +1 214.451.4822

Miami-Dade Expressway Authority:

Cindy Polo-Serantes,
Public Communications Specialist
cpolo@mdxway.com Tel: +1 305.637.3277 ext.2209



ITP logo for 2009

DCS has designed a new Idris Certified logo for exclusive use by its ITPs. The logo, available on request from DCS, may be used by ITPs to highlight their accreditation as an Idris Technology Partner, using the logo in association with marketing and publicity pieces or simply by adding it to equipment and hardware.

For further information or to request a copy of the logo, contact Teri England teri@diamond.demon.co.uk

NEXT EDITION

ETCC 10-year anniversary

OSI/ETCC project: Chicago (IHSTA) project (completion expected April/May)

Testing times: TRMI test results

Finding space (Idris & parking)

Idris delves deeper (deep loop research)

Weighing up the solution - Central Weighing & Idris technology



Diamond Consulting Services Ltd,
Chestnut Farm, Dinton, Aylesbury,
Bucks. HP17 8UG
Tel: +44 (0)1296 747667
Fax: +44 (0)1296 747557
Email: idris@diamond.demon.co.uk



E-470 Public Highway Authority's cashless alternative

With economic gloom sweeping the globe, any form of traffic technology which will ease the strain on the motorists' pockets is sure to be a hit. Be it reducing fuel consumption or reducing journey times, E-470's cashless alternative to conventional tolling is set to change the face of motoring in Denver in the state of Colorado.

E-470 first implemented non-stop tolling with Idris's help in 1991, naming it EXpressToll. E-470 was among the first tolling facilities in the United States to use a high-speed electronic toll collection system. Drivers were charged the toll without having to stop or slow down at its mainline toll plazas and ramp plazas.

Due to advances in technology, new changes have been implemented, once again taking E-470 into a new era of tolling.

Since 1 January this year, users of E-470's 47-mile toll around the eastern perimeter of the

Denver metropolitan area, have been experiencing a cashless alternative to tolling. License Plate Toll was introduced as another option to pay a toll. Since 4 July, 2009, coin and currency payments are no longer available on E-470. Payments are made only through an EXpressToll account or License Plate Toll bill.

The system will enhance safety, speed and convenience for E-470 toll users, as well as improving the environment. Eliminating stop-and-go traffic and idling in cash lanes, drastically reduces the levels of Co emitted and fuel consumed. Idris technology provides the project with the highest level of AVC accuracy and confidence, well equipping it for today's demanding roads.

For more information go to www.e-470.com or contact Teri England teri@diamond.demon.co.uk

E-470 co-host IBTTA meeting in Denver, Colorado, 19 - 21 July

Incident Management, Safety and Security

IBTTA is the worldwide alliance of toll operators and associated industries which provides a forum for sharing knowledge and ideas to promote and enhance toll-financed transportation services. On the 19 July E-470 Public Highway Authority and Northwest Parkway, LLC are combining forces to host the next IBTTA meeting.

Teri England, Idris Project & Marketing Manager, will be

joining other leading transport industry figures from around the world to converge on the Westin Tabor Center, Denver for the week. Delegates will participate in numerous talks ranging from communications methods and tools for incident management, safety, and security to the role of engineering and maintenance in prevention and safety. The meeting also includes an

opportunity for delegates to take a technical tour of E-470's toll facilities along with a demonstration of Northwest Parkway's Dedicated Short Range Communications prototype system. The tour will give IBTTA Delegates an opportunity to see how smoothly E-470's conversion to cashless tolling has been and what the whole experience has meant.