



Road Traffic Accidents: A Worldwide Issue

Key Facts - Road traffic crashes

Source: <http://www.who.int/mediacentre/factsheets/fs358/en>

1.25 million people die each year

The leading cause of death among the **15 and 29 year-olds**.

Cost most countries **3%** of their GDP.

Predicted to become the **7th** leading cause of death by 2030.

The **2030 Agenda for Sustainable Development** has set a target of halving the global number of deaths and injuries from road traffic crashes by 2020 - but HOW?

Smart Mobility

Mobility and transport are essential if a city is to function properly. There cannot be a smart city without Smart Mobility. It should be connected and citizen-centric, which is accessible to visitors and residents, travelling and moving goods across the city trouble-free, bringing citizens and visitors more convenience, better quality of lives, more sustainable power usage, higher level of safety and city competitiveness.



**R&D, Integration,
Production, Application**



4S Solution



Accidents: Avoidable?

Education, law enforcement and self-awareness have been the main foci in accident avoidance. Empirical studies show that 94% of accidents is caused by human driving behavior.

4S Solution consists of the finest selection of sensors with Big Data Analytics harnessing the Internet-of-Vehicles (IoV) with reduction of fuel and CO₂ emissions by 16% respectively, it may reduce 45% of road accidents instantly and redefine road safety standards with its complete set of human driving behavior big data.

Introducing GREENSAFETY Technology

Greensafety Technology (GST), established in Dec. 2015, is committed to R&D in reduction to road traffic accidents. Our 4S Solution was officially launched in 2017 with invention patent. In Dec 2017, GST has provided services to partners & clients in Hong Kong, Macao, Mainland China, Taipei etc. In addition to successful circulations and partnerships in other countries or regions, we hope 4S solution will become phenomenal in Hong Kong as well.



** Not in scale*

4S: The Profile



Headway Monitoring Warning

Lane Departure Warning

Forward Collision Warning

Pedestrian and Cyclist Collision Warning

Traffic Sign Recognition



HMW

LDW

FCW

PCW

TSR



Customers: Hong Kong, Macao, Taiwan, Mainland China, etc.



40+ Media interviews for past 6 months



Chief Executive of Hong Kong SAR and 20+ governments officials visit in person for details



Provide exclusive Hong Kong minibus open data to Hong Kong Science Park Data Studio



Patent obtained.

Accurate sound and screen alerts, prompting drivers to avoid accidents.

Instant Impacts

By pointing to the main causes of traffic accidents, the number of traffic accidents can be directly reduced;

The costs of vehicle insurance, maintenance costs etc. can be reduced correspondingly;

Reports from Jockey Club Heavy Vehicle Emissions Testing and Research Centre show that carbon emissions and fuel consumption are reduced up to 16% ;

Ready to use, in line with legal requirements.

4S: Your Driving Companion

Dashcam, Black-box or 4S?

- Real-time alerts, data analysis-based applied effectively avoid traffic accidents. Video clips automatically captured for playbacks, studies and investigation.
- Unique and complete set of human driving behavior.
- 4S is low cost with big data, instant installation.
- 4S can prevent vehicles being too close, failure to brake, collision, wrong turn and other major causes to road accidents.
- Collected data are comprehensive, accurate and complete, out-ranking "self-rating" APP.

Uniqueness

- Israeli top technology selected which accuracy is globally recognized in line with EU standards.
- Automatically captured dangerous driving videos can be viewed real-time with human driving behavior big data analysis.
- Data uploaded real-time, full control of driving behaviour and vehicle information.
- Extremely high scalability, it can link with different sensors to collect air pollution, fuel consumption and other sets of data.

4S Solution Benefits

1. DRIVER

- Protection from criminal penalties
- Reduce accident

2. FLEET

- Driving Safety Standard (KPI)
- Good Drivers Rewarded
- Efficiency improved

3. COSTS

- Fuel Efficiency (Up to 16%)
- Reduce Tear & Wear
- Reduce Insurance

4. CORPORATE

- Safety
- Reputation
- Big Data Market Player

5. GOVERNMENTS

- Instant accident blacksite statistics
- Town planning
- Highway infrastructure
- Smart City

Realising Upward-spiral Ecosystem

Our Big Data



In 2017,
Road accident warning count
~ **3,600,000** times



In 2017,
Vehicle Mileage
~ **3,300,000** kilometres



For the past 3 months,
Video clips
Automatically captured
~ **1,100,000** pcs



4S Solution Functionality

Key functionality of 4s Web-based platform

1. Driving Safety Score and Grading for each company/vehicle/driver
2. Driver's CV with driving behaviour in details
3. Driver's ranking within the company
4. Auto-capture 10-second video clips of Dangerous Behaviour
5. Geo-locations of driving behaviour warnings
6. Live location on map
7. Historical route details of each trip
8. Geo-fencing control and alerts
9. Driving behaviour big data analytics depend on client need
10. Custom reports depends on clients' needs, e.g. Abnormal vehicle/driver report, mileage report, unused vehicle report

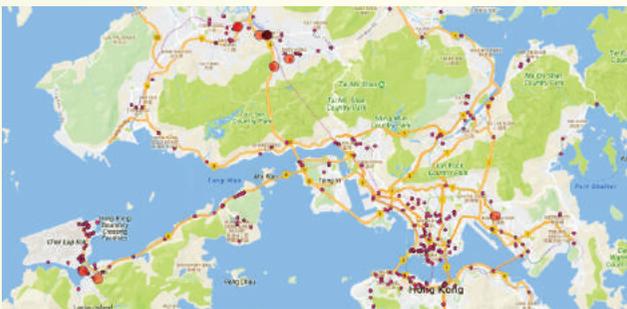


Management Platform

Fleet/ driver/ vehicle driving Safety Performance

Viewable by fleet/ vehicle/driver performance with average safety scores

Criteria-based Dangerous Driving Video with vehicle and driving data overlay on videos



City-scale Big Data Analytics

Big Data Analytics to screen out potential dangerous spots for the whole city (Black dark red spot indicates location with high frequency of driving warnings)



4S Big Data platform

Uploading data in real-time, providing a real-time online checking. The platform will automatically generate drivers' data, driving route reports and automatically capture 10-second video clips of dangerous driving behaviours.

All-rounded Protection

4S Safe Driving



(module A)

SVL Heavy Series



(module B)

Safe Driving + SVL



(module A + B)

Another module in the 4S Solution is the SVL Heavy Series features up to eight cameras with 960H resolutions. It has the advantages of real-time view, instant back-pass and applicable to a wide range of vehicles, such as 35-ton tractors, dangerous goods vehicles and so on.



Live-video Support



Left to Right: 7-inch display screen group, Fuse group, Extractable hard drive, Waterproof quick-disconnected cable, Signal connection wire, Power regulator, Stainless steel lens stand.

4S' Secrets - B.E.R.E.B

- | | |
|------------------|--|
| 1. Box | Professional one-off installation |
| 2. Effects | Significantly reduced road traffic accidents + Big Data analytics |
| 3. Reductions | Casualties, Societal loss, CO ₂ Emission and fuel consumption (up to 16%) |
| 4. Enhancements | Driving behaviour, road safety, management efficiency, smart city |
| 5. Beneficiaries | Pedestrians, Drivers, Passengers, R&D, Public Policies |



Real-time view with phones, tablets and computers

Profession and Passion with Recognitions

Taiwan EGK

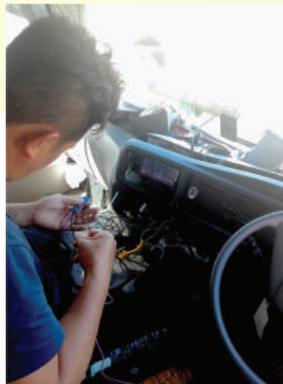
Our company serves more than 6,000 vehicles. GST is a successful partner of the project and we are willing to strengthen cooperation with GST. By making good use of 4S Solution, we are working together to contribute to the road safety in Taiwan.



Macau Explorer

There are many cars crowded in narrow roads in Macau, while the city receives 30 millions of tourists each year. From explanation to installation, the GST team has performed professionally and responsibly. With the development of transport infrastructure in Macau and Hong Kong, we believe this technology will be widely applied.

Through mass production enterprises can reduce the price of finished products. In addition to greatly enhancing the market competitiveness, users can be benefited from the low costs. GST is moving towards it with great endeavor.



Hutchison Telecommunications International 3 Hong Kong

GST's 4S Solution, through the high coverage and connection with large scale Internet of Things (IoT), real-time feedback of each vehicle driving conditions is provided. When improper driving behaviors are detected, the system can make immediate warnings and greatly improve traffic safety.



China Listed Company New Auto Element

After the bus and logistics companies apply GST's 4S intelligent driving safety solution, the accident rate dropped significantly. GST team is passionate and assuring. We believe this technology will become more and more prosperous in China's market.

On Trials / Partners



China Light & Power
Hong Kong Limited



MTR



Shenzhen EBus



Taipei Bus



Transmac



3 Macau,
Hong Kong



K.Wah Construction
Materials Limited



偉全 建築有限公司
Welcome Construction Co., Ltd.

Welcome Construction Co. Ltd.



佳駿 科技有限公司
EGK

Evolution GPS Tek



EMSD



Hong Kong Science Park
Data Studio



Inchcape Hong Kong

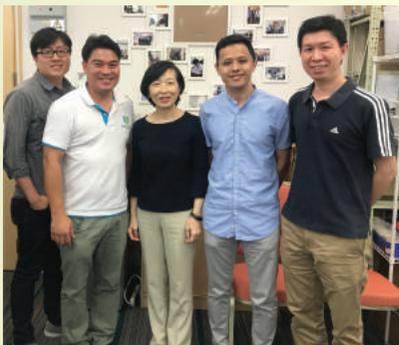


15904C

Public Light Bus Scheduled
Service (Green Minibus)



For a Far-reaching Future



1: Recent out-reach events

Top left: STEMUPxHK18 Educational Event

Top right: EBus driver training in Shenzhen

Below Left: 2018 Taipei Smart City Summit & Expo

Below Right: Mingpao Student Reporter exchange programme for highschool students

1

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2: Mrs. Fanny LAW FAN Chiu Fun visits GST Office

3: Transmac (Macau) kicks off 4S trial

4: Joint release with EMSD on Innovation Day



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7

5, 6 and 7: Introducing the 4S Solution and its application principles, development direction and high praise from customers to all sectors of the community including but not limited to lawmakers.

Far left: HON Eunice YUNG from NPP.

Middle: HON Charles MOK from The Professionals Guild.

Far right: District Councilor Bill TANG Ka Piu from FTU and DAB.



8

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9



8: Belt and Road Forum representing Hong Kong in Great Hall of the People

9: Vietnam and Cambodia Delegation

10: Mentoring Programme

Recent Awards

Most Potential Award on Big Data Analytics (Public Transport), National News Agency, CPPCC Auditorium, Beijing. November 29th 2017



Innovation and technology are drivers for economic growth and the key to enhance business competitiveness. Award winning case of GST attest to successful implementation, encouraging industry adoption, creating a mutually beneficial interaction between technology and business sectors.



**Smart Mobility Award
2018 ICT Awards - April 4th 2018**



Comments from judging panel:

The solution offers a complete set of fleet management practice entailing monitoring, data analytics, improvement measures, and support for the broader road management. By enhancing driver safety and helping business management, the solution also encourages road safety and carbon reduction for the greater good of the community.



Media Coverage



Mingpao Daily (Headline)

"Many Hong Kong companies have yet to accept new technologies. They often ask whether the others have already tried before themselves."

Government

"By installing sensors and video cameras on the front of the vehicle, road conditions are analyzed to provide motorists with real-time hazard warnings. The collected data will help monitor driver's driving behavior and identify traffic black spots in the future."

- Secretary for Development Wong Wai Lun



TVB - The Scoop (Feat.)

"This system can give alerts immediately. The driving behaviors will be collected and analysed as big driving data."



TVB - Innovation GPS (Feat.)

I do not dare to drive in Hong Kong even if I have my license. Let's look into a device installed in the vehicles and see how it may reduce traffic accidents.

Apple Daily (Tech Headline)

A technology company in Hong Kong owning their 4S Solution to analyze drivers' driving behavior and reduce road accidents.

Hong Kong Economic Times (Tech Headline)

There is a technological gap regarding traffic safety. Antonio Wong invested some millions of HK dollars in GreenSafety Technology and developed the Safematics Smart Safety System Solution.

Business Mission to ASEAN Countries with Hong Kong SAR Government

Visiting Vietnam and Cambodia, March 2018

Secretary Edward Yau of CEDB, Hong Kong SAR has taken "a 48-strong delegation" including GST's GEO Antonio Wong to Cambodia and Vietnam, the first stop to ASEAN since HK signed an FTA with the bloc last year. The delegation promoted collaboration in trade between HK and Cambodia, and got to find out more about local policies, the business environment, and opportunities. We look forward to sharing with you more of these top level foreign visits in the near future.



GST Core Team



Antonio WONG Shek-tung

Chief Executive Officer & Co-Founder, young entrepreneur, graduated from the Department of Statistics, University of Manchester, UK. Former investment banker. Dedicating to public affairs and committed to the use of big data analytics and Internet of Vehicles (IoV), Antonio is also a co-founder of think tank EntreLink. He wished to use his administrative experience and big data analytic skills to build a Smart City.



Ben WONG Chun-kau

Chief Operation Officer & Co-Founder. Experienced driving safety experts, graduated from the Department of Applied Physics, The City University of Hong Kong. Ben introduced traffic safety system to Hong Kong back in 2011 from Netherland. Hong Kong Transport Department's approved minibus Speed Limiter supplier and installer.



Bill TANG Wai-piu

Chief Technical Officer and Co-Founder, senior electronic system developer. He has worked in foreign companies as project manager and on systems about technological R&D. Bill is keen to explore knowledge about technology and R&D and has designed the main platform for 4S Solution. He believes road safety can be enhanced through big data analytics and IT.



Jacky LEUNG Ka-ho

Executive to CEO, awarded as New World Group Young-STAR for his outstanding performance. He joined GST to embrace the new challenges of the innovative industry. With his craftsmanship and amiability, GST has a wonderful team spirit and effectiveness.

Prof. Jackson HO Yee-tak, PHD, MH

Chief Advisor, Hong Kong transport icon, traffic accident investigation specialist. He holds the Medal of Honor of Hong Kong SAR. In 2013, Professor Ho was awarded the Honorary Fellowship of Vocational Training Council. He had been a former Member of the Road Safety Council for 12 years and is currently the Chairman of HKJC Heavy Vehicle Emission Testing and Research Center Steering Committee. He served as a professor at the Hong Kong Polytechnic University.



Ms. Fionz CHAN Sum-yin

Director of Corporate Communication, Hong Kong registered social worker, professional emcee and presenter, international recognized etiquette trainer. Fionz graduated from Hong Kong Polytechnic University. She was a corporate communication and training mentor for listed companies and has been an excellent “super contact person” in business sector.



Ashley CHAU Man-fong

Corporate Strategist, graduated from The Chinese University of Hong Kong. She served as the youngest board member in major non-profitable organizations. She promotes the company with a hybrid methodology and wish to see this aspiring Hong Kong startup thrive transnationally.



Hiko LEE Tsz-chun

Account Executive, young and energetic. Hiko worked in foreign trade industry with outstanding performance. After learning about GST's goals, he requested to join this special team at once. His passionate and intensive inputs are much appreciated.





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Kyaw Myint Than (Myanmar), Dec 2017, Watercolour

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