

CARMEN® the ANPR engine

Exceptionally versatile ANPR (LPR) engine for traffic or access control applications



What benefits does the CARMEN® ANPR engine provide you with?

1. High accuracy and speed

Carmen® was developed for exceptionally high rate of number plate reading (95%+). The image processing of Carmen® ANPR software library is remarkably fast.

2. Build your own ANPR system

Carmen® was designed for system integrator companies who want to build their own ANPR system and they need an accurate and flexible software tool for recognizing license plates. OEM versions are available as well.

3. Country

independent OCR technology

Carmen® recognizes any license plates containing Arabic, Latin, Chinese, Korean characters. Carmen provides plate color and country ID. Special personalized license plate reading: vanity plates, prestige plates or private custom number plates.

4. Hardware independent technology

Carmen® runs on various kind of computer systems (desktop, embedded, etc). It can be linked to any type of camera equipment (even third party camera). Our dedicated ANPR cameras are recommended for image capturing.

Char	Left	Top	Bot	W	H	Sk	Chr
ocr time	143	155	248.2	97	1052	237.0	
char height	16	17	15.3	10	20	2.9	
plate slope	4	4	-4.1	0	7	1.6	
plate slant	-4	-8	-7.4	-13	0	3.7	
plate left	170	170	177.7	2	297	79.1	
plate top	112	149	149.7	73	222	38.9	
plate right	272	272	276.8	124	379	66.7	
plate bottom	133	168	169.6	85	244	40.7	
char count	6	6	6.1	6	8	0.4	

License plate: **HYM 757**
Country: **HUN**

Carmen® is currently installed and running in more than 200 countries around the world.

Typical application environments:

- Highway Toll Collection/Speed enforcement
- Vehicle Access Control/Entrance Admission
- Vehicle Theft Prevention/Detection
- Traffic Monitoring/Bus lane or red light enforcement
- State Border Surveillance/security monitoring
- Public/private car park management/automation
- Airport/harbour cargo management/control

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CARMEN® FREEFLOW

An innovative technology for toll collection, traffic surveillance, traffic management and many other projects where accuracy, speed and automation are essential objectives. The core technology is specially designed and developed to be easily integrated into complex intelligent traffic applications. Due to its outstanding technology, its high accuracy rate, the speed of image processing and its adaptability.

The software can execute continuous license plate reading even at vehicle speeds of up to 250km/h. This feature is especially important in convicting speed limit violators or for use in automatic toll collection projects, just to mention a few.

CARMEN® PARKING

CARMEN® Parking is a special version of CARMEN® Automatic Number Plate Recognition technology. It has been developed to offer an excellent solution for the growing need of Parking and Access Control management systems. Ideal for parking management systems, controlled and automatic vehicle entry and exit where car stops moving very slow.

CARMEN® Parking offers flexible, low maintenance, yet effective and intelligent technology for car park operation. It reduces costs as well as increasing efficiency and security.

CARMEN® PARKING LANE

CARMEN® Parking Lane is a special version of CARMEN® ANPR technology. It can be used for one or two lanes of access control systems. With integration CARMEN® Parking Lane into parking management systems, it becomes possible to automate vehicle entry to and exit from a car park or a secure zone and to use the recognised registration number for inventory management.

The usage of CARMEN® Parking Lane with our specially designed ANPR camera set - equipped and synchronised with a IR flash - provides accurate and quick identification of vehicles without human assistance. The CARMEN® Parking Lane ANPR engine and its SDK is specially developed for parking management applications where automatic identification of vehicles is needed.

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