



Case study

## **FLEET MANAGEMENT : OFFICE ON BOARD**

### **Successful cooperation between Aplicom and Craiss**

When Albert Craiss founded the family company in Mühlacker (near Stuttgart) 71 years ago, the main line of business centred on the transportation of liquid products. Today, in the second and third generation under senior manager Albert Craiss and junior manager Michael Craiss, logistics and IT have become a core business area at the company, along with national and international transport operations. The Craiss company's course of development, with a current workforce of 210 and total sales of EUR 61.3 million, serves as a typical example of a new generation of medium-sized companies which have managed to position themselves successfully in a fiercely competitive market on the back of innovative concepts.

As a partner to major customers such as Deutsche Post, DaimlerChrysler, Behr or Bosch-Siemens, Craiss covers a broad spectrum of operations. In addition to classic forwarding and transport business, these also cover logistic services in the area of procurement, warehousing and distribution. Craiss is in a position to meet the most diverse requirements among its clientele, with a fleet of 410 vehicles and a Europe-wide network of branches and sales agencies in the Czech Republic, Poland, Great Britain and the Netherlands. Craiss also possesses its own warehouses in Germany at locations in Mühlacker, Berlin and Denkendorf.

### **IT as the key to success**

The growing requirements in the field of transport and logistics led to an increased demand among the company's customers for IT solutions. In order to offer its customers a comprehensive range of services in this area, Craiss set about developing a workflow, fleet and customer relationship management system back in 1993. A key objective was to optimise deployment of the vehicle fleet in Germany and abroad and to integrate the vehicles into the company's operating and information system by means of efficient fleet management. Beyond this, Craiss also aimed to reduce the proportion of operating costs, particularly in the area of communications, by means of an integrated and faster order handling system, while at the same time achieving increased transparency and improved service quality for the customer.



In 1999 the different hardware and software components were integrated into an overall system and an internet link was incorporated at the beginning of 2003. With the web-based TRANSFLOW platform "LBase Online", Craiss offers its customers fast and comprehensive consignment tracking and fully integrated order handling. In view of the extremely tight time windows for some customers, particularly in the area of the automobile industry, this represents a key contribution from Craiss towards optimising process chains.

IT manager Matthias Diehm had specific ideas about the required computer hardware for the area of the company's vehicles. He envisaged an open and expandable system with devices which would be reliable and user-friendly even in extreme road and weather conditions and easy to install. In cooperation with experienced partners such as Aplicom, a leading manufacturer of mobile vehicle computers, and Degen GmbH communication, a specialist in mobile communications and fleet management systems, Craiss developed a modular and flexible solution which can be adapted to changing requirements on the part of both Craiss and its customers at any time.

## **Mobile communications with Aplicom vehicle computer**

Dieter Gille, a lorry driver at Craiss, has had a mobile computer workstation for three years. This workstation comprises a high-performance Aplicom vehicle computer (ICA series) for text applications and data communications with integrated GPS module, a backlit LCD display, a mobile telephone (Nokia 6090) and a keypad for the manual entry of data. For the purposes of order handling in the area of route planning, Dieter Gille's operations manager transmits all the key order data by SMS to his display. Apart from the fast transmission of texts and forms, the key functions of the vehicle computer also include automatic vehicle location via GPS, the output of current status information and a vehicle security alarm. A particularly useful feature is that peripherals such as scanners and RFI transponders can be integrated very simply via serial interfaces. Craiss thus decided to introduce a keypad with integrated barcode reader which enables tracking and tracing at article level and, in turn, consignment tracking via the internet.

Whereas a major portion of communications between driver and operations management used to be carried out via radio, individual communications, e.g. via the installed mobile telephone, are now largely reserved for emergencies. At Craiss, the use of vehicle computers has resulted in a current ratio of data communications to verbal communications of 80:20 per cent. While this is a cause of some regret to Dieter Gille, for the company it represents an almost 50 per cent cut in communication costs. Dieter Gille also recognises a crucial advantage of the new technology, however: "Since the introduction of the vehicle computer, transmission errors during communications have become very rare. This used to be a major problem, particularly in foreign countries. As the vehicle is localised via GPS in parallel with input of the data, there's no longer any confusion as to the current position of my vehicle."

A further criterion in Aplicom's favour was the simple installation and maintenance of the equipment. Thanks to the compact design of the devices and the clearly arranged connections, the workshop team was able to install and service the hardware itself, following a brief training course. According to Edwin Lück, workshop manager at Craiss, this means savings on average of up to 140 euros per installation process for each complete vehicle computer workstation. Michael Leeb, responsible for IT organisation and software development, also voices satisfaction with the hardware solution: "The open architecture of the products, the robust operating system and Aplicom's extensive experience fit in perfectly with our corporate philosophy of pursuing ongoing efforts to develop our products and optimise our services."

## **Software and internet solutions in practical use**

In the area of on-board software, Craiss relies on the "Craiss-Fleet" client-server solution for efficient fleet management. This solution has been installed at the company headquarters in Mühlack and is linked via an interface to "LBase" from TRANSFLOW. The deployment of this fleetware has resulted in the optimisation of management workflows in the area of route and vehicle deployment planning, fleet management and fleet monitoring. Continuous checking of the vehicle's operational status against the stipulated requirements for the job in hand indicate any delays, for example, and any need for intervention on the part of operations management. The vehicle's location is visualised on a vector map.

The driver confirms acceptance of the job by keypad entry and the system will not assign a new job until the driver transmits an "available" signal on completing the current job. By means of the driver feedback and the positional data, the "Craiss Fleet" solution is able to identify precisely whether the run is on schedule or whether a delay is to be expected. In the case of a delay, a message is sent to the operations manager automatically by e-mail and subsequently forwarded to the customer by fax or e-mail, according to the procedure agreed with the customer.

The basic components of the IT system employed at Craiss include the "TRANSFLOW LBase" software solution with an integrated workflow management system to manage all work processes - from the receipt of orders to controlling. Using the standard "LBase" masks, the so-called "Logic Interpreter" was used to generate modules for all the necessary processes. These include covering individual customer requirements, such as collection and delivery time windows, complex rate structures or tracking and tracing information, for example. The modules were defined and set up by the Craiss staff themselves, and can be adapted individually according to requirements.

The web-based TRANSFLOW platform "LBaseOnline", which is currently in the test phase at Craiss, provides the customer with installation-free, roaming access to the consignment status. Blanket use of the Logic Interpreter, including within "LBaseOnline", enables tests, stipulations or restrictions to be defined. The reduction in installation time and expenditure for individual adaptation, updating and maintenance to the tune of up to three hours per customer enables further cost cutting, as system integration is now possible with a minimum of effort.

For the purposes of more efficient customer relationship management, Craiss has developed its own CRM software with an interface to LBase and the MS programmes Excel, Word and Outlook. This programme is used to manage the central information system at Craiss, which contains all data on customers, suppliers and subcontractors and is updated daily with the key operative job data from LBase.

## **Improved services, quality and cost efficiency**

According to operations manager Thorsten Kurfiss, the experience to date shows that the new IT system has proven a success with customers and employees alike. For customers, the direct link and integration into the process flow means that they are able not only to call up the current location of their consignments at any time, but also to ascertain the precise time at which their load will arrive at the loading or unloading location. This means an improved level of reliability, service and quality.

Beyond this, the new system also reduces the workload for operations managers and sales personnel. Tiresome routine work is eliminated and problems such as delays or cases of damage or loss can be handled more quickly and with less stress. According to Thorsten Kurfiss, allocating jobs by electronic means cuts the work time involved by around 80 per cent in comparison to manual allocation involving verbal communication with the driver. He is now able to invest this time in more intensive customer care activities. On the basis of experience to date, the integrated, blanket evaluation of all job- and vehicle-related data also enables improved maintenance of the vehicles.

Although Michael Leeb sees plenty of scope for further optimisation and development, he believes Craiss is well set to address the challenges of the future. "We are already able to respond flexibly to all types of requests from our customers. As a logistics partner and part of the process chain, we supply information from beginning to end - and not just in a passive role, but pro-actively, too. In contrast to some competitors who are only now developing IT solutions, we already possess in-depth experience and a network of innovative partners", notes Michael Leeb.

**For further information, visit: [www.degen-comm.de](http://www.degen-comm.de), [www.craiss.de](http://www.craiss.de)**

## **THE APLICOM COMPANY**

Aplicom Oy is one of the leading international manufacturers of vehicle computers in the professional vehicle segment. The Finland-based company develops and produces fully programmable computer hardware for vehicles. The vehicle computers are compatible with all common software systems and come with a tailor-made software package.

With its extensive product portfolio, Aplicom offers "one-stop shopping" in over 18 countries today - from the simple vehicle computer to the high-end variant with display. The programmable vehicle computers from Aplicom provide a neutral platform for the most diverse fields of application and means of transport, such as lorries, buses, trains or ships.

Over 90 per cent of all Aplicom products are exported and employed by companies, organisations and authorities in Europe. These include Schenker, DaimlerChrysler, the Craiss haulage company, Hungarocamion, leading European automobile clubs such as the ADAC, the Norwegian and Swiss postal services, the Dutch customs authority, the municipal department of works in Vienna, the local public transport system in Athens (HLPAP) or the state railways in Norway, for example.

Aplicom products support integration of the vehicles into the operating and information system. They provide for more efficient fleet management, thereby enhancing the competitive capacity of a company or an organisation. They are also instrumental in improving security and in enabling the comprehensive monitoring of vehicle operations.

Aplicom's research and development department and production facilities are located at the company's headquarters in Äänekoski, central Finland. Marketing and sales are managed from Helsinki.