iControl™

iControl AC | iControl DC

Integrated, intelligent, intuitive: the next generation in elevator control technology

Designed from the ground up using next-generation technology, **iControl** is the revolutionary platform that outperforms today's industry-standard controllers. How? Through integration: A system of components that work together, smoothly and automatically, to deliver the best possible performance.

iControl delivers processing performance through the intelligent iBox processor and motion performance through closed-loop-control, 16K PWM AC or 12-Pulse DC drives.

Configuration, diagnostics, and adjustments are handled through iControlware, a user-friendly software suite designed specifically for iControl. iCue software, running on a centralized dispatcher or an iBox in an elevator group, uses artificial intelligence to make optimal dispatching decisions.

An innovative, maintenance-free landing system uses sensors and magnetic encoding to ensure absolute hoistway position — without tape or switches. iControl's cartop station converts discrete car signals to serial communication for transmission to the iBox, reducing traveler cable bulk and expense.

Through high-tech electronic integration, intelligent buildings maximize efficiency, respond faster to changing user needs, and control resources at the lowest possible cost. It's precisely this kind of building-sensitive, forward-thinking integration that can maximize elevator return on investment and maintenance value — with iControl.

iControl AC

Applications

- Modernization or new construction
- Low-rise through high-rise — up to 96 stops, as little as one inch between floors
- Gearless or geared, induction or permanent magnet (AC only)
- Groups up to 15 cars
- 1,800 fpm, 9.14 mps

Benefits

- Intelligent — automated calibration, dispatching and traffic-handling allow iControl to learn and optimize for specific building requirements, increasing owner and tenant satisfaction.

- System self-configures for standard commissioning tests — you select the test, iControl sets up for it.

- Intuitive — Windows-based user interface is easy to learn and use, reducing installation time and maintenance cost.

- Safe — the most direct, advanced solution available, designed for ASME A17.1-2004/ CSA B44-04 code compliance, with robust engineering that anticipates updates.

- Cost-effective — streamlined, field-configurable hardware design. Fewer components to install, maintain or replace.

- Flexible — modular software and hardware layers accommodate changing system needs, gracefully and economically.

- Responsive — robust Ethernet interface facilitates secure remote monitoring, remote equipment control, remote diagnostics, even real time remote troubleshooting and adjustment.

- Create and configure complex car and group installations off site — then upload, remotely or from the machine room. Create and re-use a "golden" file with minor adjustments from job to job.

www.mceinc.com

800.444.7442
916.463.9200

MCE
Motion Control Engineering®
A Kinetek Company®

The leader in non-proprietary controllers, technical services and repair solutions for elevator modernization.

iControl AC | iControl DC

iControl specifications

	iControl AC	iControl DC
Maximum car speed	1,800 fpm, 9.14 mps	1,800 fpm, 9.14 mps
Configuration	Simplex and group	Simplex and group
Landings	96	96
Drive type	16K pulse width modulation flux vector, with optional regenerative drive	12-pulse, fully regenerative
Motor control	Velocity feedback	Velocity feedback
Landing system	Sensors and magnetic encoding ensure absolute hoistway position	
Configuration, monitoring and reporting	iControlware suite for monitoring and changing state of controllers/dispatchers. Includes iView, iMonitor and iReport	
Dispatching	PC-based or embedded microcontroller software intuitively assigns hall calls to controllers	
Environment	32–104˚F, 0–40˚C, humidity non-condensing up to 95%; harsh environment rugged service options available	
Standard enclosure	42" w x 72" h x 16" d, 914.4 x 1,447.8 x 304.8 mm Enclosure size may increase per specific application	

iControl features

Powered by intelligent iBox processor and closed-loop 16K PWM AC Drive, or 12-Pulse DC Drive, and supported by integrated system components:

Intelligent dispatching software

- Powerful, software-based dispatching engine uses artificial intelligence to continually optimize dispatching decisions.
- Easily modify, refine and scale configuration to meet changing traffic patterns.
- Modular upgrades ensure long-term performance, flexibility and return on investment.
- Real-time car status information delivered via high-speed, high bandwidth network for optimized response.

iControlware suite

- Windows-based interface enables on-site or remote analysis, diagnosis and parameter adjustment.
- Easily set up and adjust controller configuration.
- Conveniently and flexibly manage multiple elevators and locations from a single PC.
- Client-server system gathers, archives and reports elevator performance data for on-site or remote access.
- Flexible programming options for on-demand or scheduled reporting of performance criteria.

Precision landing system

- Innovative system uses sensors and magnetic encoding to ensure absolute hoistway position.
- Maintenance-free operation with fast, easy cartop installation and adjustment.

Cartop wiring connection box

- Reduces traveling cable wires for labor and material savings. Plug-and-play installation reduces setup time.
- Traveler and hoistway cable tailored for iControl. All conductors clearly labeled and color-coded. Eliminate connection errors and save installation time.
- Prevents doors from opening unless car speed is within acceptable limits.
- Maintains absolute position of the car during a power failure.