# siteco



Types,
data sheets,
configuration –
everything at a glance:
Floodlight
FL 11

# Floodlight FL 11

Developed for games that make history.

Quantum leap Floodlight.



### Brings the game into the spotlight

With precise illumination for perfect visibility on the field.

### As flexible as your game schedule

Selectable lighting scenes via app or switch using your existing wiring – for training, games or events.

### Protects residents, environment and insects

No light pollution – light only where it is needed.

### Easy to maintain and built to stay bright

Easy-to-clean optical cover over glass panel – with internal glare shields.

#### Visual comfort for players and fans

Thanks to optimized light control without annoying glare.

### With full service on request

From luminaires and masts to turnkey solutions.

### A perfect fit for your field

Easy to retrofit – existing masts can usually be reused.

### Extends the life span of your field

Real-time data for optimum maintenance and use of your sports facility.



# FL 11

The FL 11 marks the beginning of a new era in sports field lighting. Highest light output. Precise illumination. Perfect playing conditions.



C C Light immission

Targeted with 0 % light immission

Asymmetrical light distributions ensure precise illumination – without light spill or scattered light.

Light that protects insects

At 3,000 K, the FL 11 attracts fewer insects and thus protects the ecosystem.

Extra insect-friendly lighting at

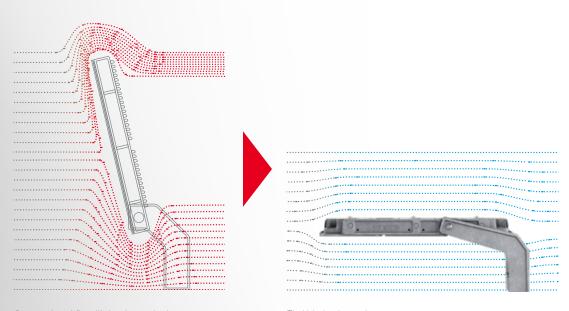
# A winning combination: efficiency and sustainability.

#### Minimum wind profile, maximum benefit

Thanks to their horizontal mounting, our floodlights offer significantly lower wind resistance than conventional models – saving costs and protecting the environment:

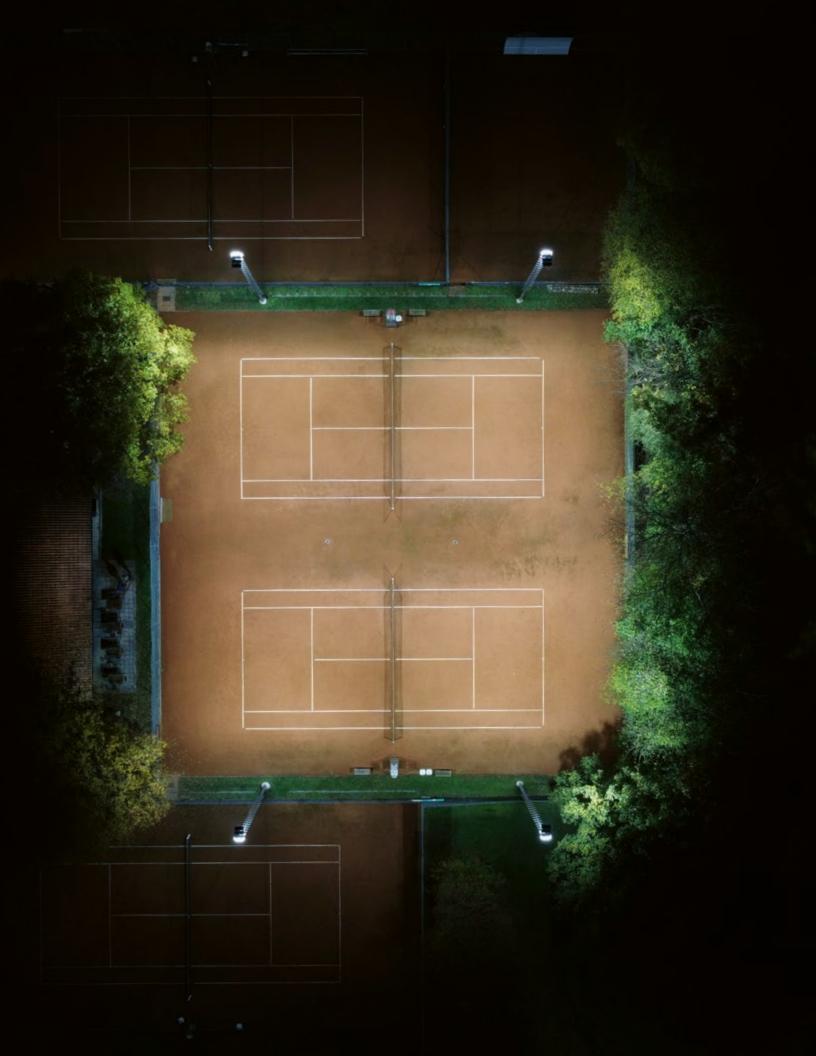
- Reduced dimensions of masts and foundations
- Use of the existing masts possible

Efficient. Sustainable. Economical.



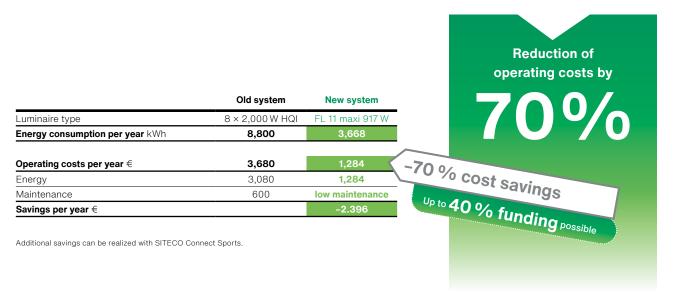
Conventional floodlights in vertical arrangement

FL 11 in horizontal arrangement



## Savings potential for your lighting and installation of a 4-mast system.









### Master of adaptation.

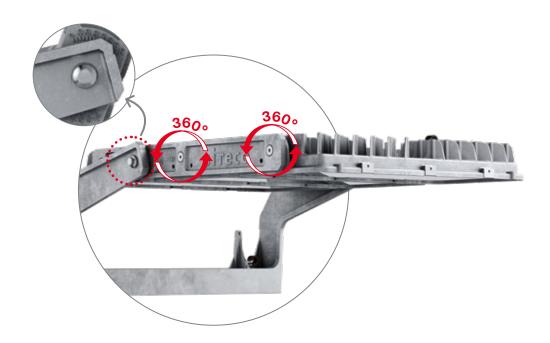
The FL 11 has a modular design – for maximum flexibility in planning, installation and lighting.

#### Flexible placement options

With an external ECG, maintenance becomes a breeze. Directly on the luminaire or flexibly mounted on the mast.

#### Flexible connection options

230 V or 400 V? You decide. The versatile ECG keeps all options open – up until installation.



#### Flexible adjustment

360° rotatable modules and a finely adjustable light head ensure precise, needs-based illumination.

#### Flexible planning

Individually combinable optics – for customized light distributions, perfectly tailored to any placement situation.







The FL 11 is available with an optional Smart Interface, providing Zhaga-D4i standard connectivity.

The advantages speak for themselves:

- Modular replacement
- Easy retrofitting
- Tool-free installation
- Maximum efficiency



# Sustainability. Consistently implemented.

- Made in Germany
- · Short supply chains for fast availability
- Easy implementation of customized solutions
- · Few, recyclable components
- · Plastic-free packaging

A quantum leap for your sustainability.

100 % In-house development and production

100 % Modular product concepts

100 % Customizability and replaceability



# Floodlight FL 11 variants.





FL 11 maxi



FL 11 maxi pro

#### **Technical data**

Rated luminous flux: up to 173,200 lm

Rated power: up to 1,276 W

Luminaire luminous efficacy: up to 155 lm/W

Rated service life: up to 100,000 h

Recommended mounting height: from 10 m

#### Variants

Power (for outdoor sports facilities)

Longlife (for industrial applications)

#### Weight

With ECG on bracket 23.1 kg, remote 17.2 kg

#### **Applications**

Sports grounds, stadiums, arenas, airports, container terminals

#### **Technical data**

Rated luminous flux: up to 259,300 lm

Rated power: up to 1,937 W

Luminaire luminous efficacy: up to 155 lm/W

Rated service life: up to 100,000 h

Recommended mounting height: from 16 m

#### **Variants**

Power (for outdoor sports facilities)

Longlife (for industrial applications)

#### Weight

With ECG on bracket 29.4 kg, remote 23.5 kg

#### **Applications**

Sports grounds, stadiums, arenas, airports, container terminals

#### Optics concept

Lenses made of PMMA, without yellowing

#### **Light colors**

3,000 K | 4,000 K | 5,000 K | 5,700 K

Color rendering: CRI 70 | CRI 80 / 90 (only for 5,700 K) or on request

Light immission: 0 %

#### Protection class

IP66

Protection class: SK I

Also available with corrosion protection class C5







#### Overview of variants

ECG on bracket or remote up to 150 m

Rated voltage: 220 ... 240 V | 380 ... 400 V, 50 / 60 Hz, AC

DALI 2 or DMX-RDM, Smart-Interface

# Dribbling, shooting, cheering – on every soccer pitch.

Whether 4- or 6-mast systems – our Floodlight FL 11 is configured to cover all standard layouts and meets the existing association and regulatory requirements with 0 % light immission.

### Application examples with the FL 11 in light color 3,000 K CRI 70

Playing field: 105  $\times$  68 m; mounting height: 16 m

#### 4-mast system

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#### FL 11 maxi

4 masts	Lighting class II	Lighting class III	Lighting class II	Lighting class III
Light distribution	8 × PL33T 4 × PL64	4 × PL64	8 × PL33T 4 × PL64	8 × PL33T
Horizontal illuminance Em	258 lx	93 lx	206 lx	114 lx
Uniformity U0 g1	0.66	0.57	0.68	0.63
Total number of floodlights per field	12	4	12	8
GR-max value	47.8	45.7	46.4	46.7



#### 6-mast system

#### FL 11 maxi pro

#### FL 11 maxi

4 corner masts and 2 center masts	Lighting class II	Lighting class II	Lighting class III	Lighting class III
Light distribution	8 × PL33T 2 × PL64	8 × PL33T 4 × PL64	4 × PL33T 2 × PL64	8 × PL33T
Horizontal illuminance Em	222 lx	273 lx	137 lx	124 lx
Uniformity U0 g1	0.68	0.7	0.67	0.61
Total number of floodlights per field	10	12	6	8
GR-max value	49.7	47.4	47.3	44.9



Lighting standards and requirements of the associations	Class I	Class II	Class III
Horizontal illuminance <sub>Eav</sub> lx	500	200	75
Uniformity U0 <sub>Emin</sub> / Eav	0.7	0.6	0.5
GR	55	55	55
Color rendering index <sub>Ba</sub>	70	60	60

Explanation of light distribution:

**PL33T:** Area lighting, beam spread relative to mounting height: width 3 / depth 3, with triangular distribution

**PL64:** Area lighting, beam spread relative to mounting height: width 6 / depth 4

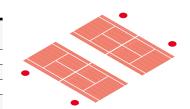
# Game, set, match – on every tennis court.

## Application examples with the FL 11 in light color 3,000 K CRI 70

Playing field:  $35\times35\,\mathrm{m};$  mounting height:  $10\,\mathrm{m}$ 

#### 4-mast system

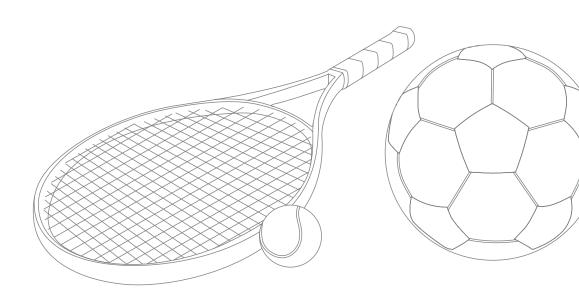
	FL 11 maxi pro	FL 11 maxi	
4 masts	Lighting class II	Lighting class III	
Number of floodlights per mast Light distribution	4 × PL64	4 × PL64	
Horizontal illuminance Em	353 lx	235 lx	
Uniformity U0 g1	0.75	0.75	
Total number of floodlights per court	4	4	
GR-max value	39.2	39.2	



Lighting standards and requirements of the associations	Class I	Class II	Class III
Horizontal illuminance Eav Ix	500	300	200
Uniformity U0 Emin/Eav	0.7	0.7	0.6
GR	50	50	55
Color rendering index <sub>Ra</sub>	70	60	60

#### Explanation of light distribution:

**PL64:** Area lighting, beam spread relative to mounting height: width 6 / depth 4



# Effortless operation with unique mast solutions.

We have reimagined mast solutions. With innovative telescopic and raise and lower masts.

A revolution in installation and operation.

Minimal effort for installation at maximum speed.

SITECO mast solutions require neither cranes
nor helicopters. And the same goes for maintenance
and servicing.

Simply lower the mast and work comfortably on the floodlight system. With heights from 6 to 50 meters, we offer the right solution for every sports field.

A quantum leap in comfort.

Up to 80 % lower maintenance and installation costs

Only DETSON
for annual maintenance

No crane or helicopter for installation and maintenance

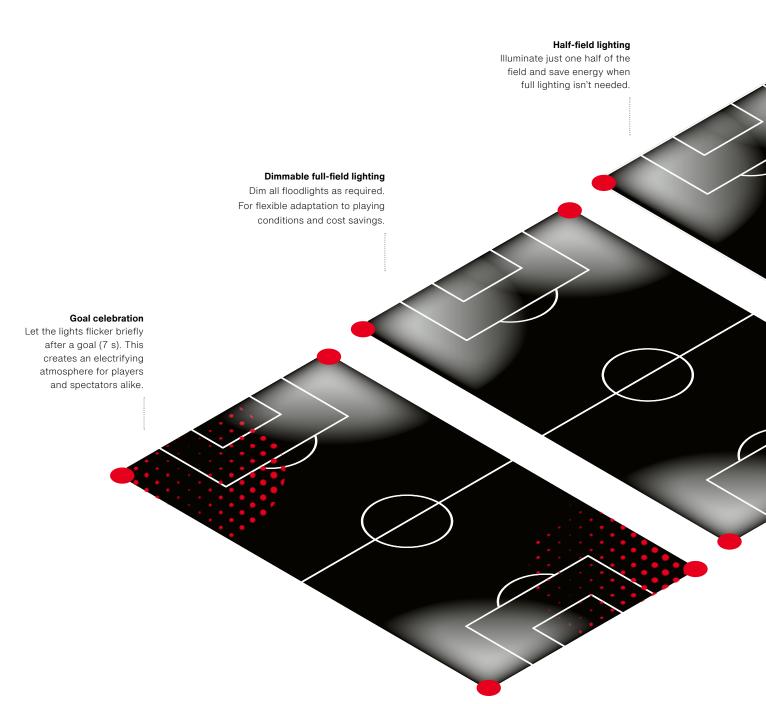




## Always the right light. At the touch of a button.

Dimmed half-field lighting for training, brilliant color rendering for the derby game. Lighting scenes can be adjusted at any time – flexibly and easily via our app.

SITECO Connect Sports for perfect lighting at every game.



#### Multifunctional single-light control

Control a single floodlight. For example, perfect for team talks or individual



- Simple lighting control via tablet or smartphone (Android or iOS)
- No Wi-Fi or rewiring required
- Flexible use & configuration tailored to your individual needs
- Maximum energy savings thanks to customizable lighting scenes
- No license fees

# Perfect playing conditions thanks to Intelligent Play.

Al-powered analysis of turf conditions to solve challenges faced by sports facility owners and managers.





# Play better.

Optimum playing conditions at all times thanks to precise real-time data on turf quality.



# Last longer.

Extended turf life through full transparency on field conditions and automated maintenance recommendations.



# Play safer.

Minimize the risk of injury for players by identifying high-stress areas and planning appropriate maintenance and protective measures.



## Be greener.

Maximum sustainability through efficient maintenance, increased productivity and extended turf lifespan.



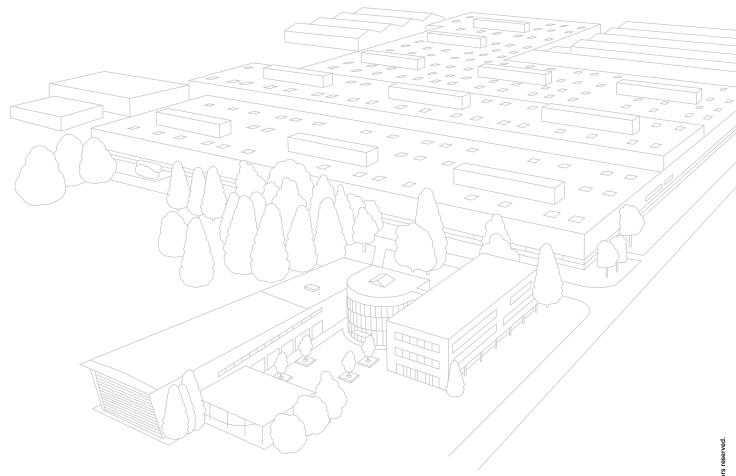
# Top-level expertise and a single point of contact.

Turnkey projects require expertise – in every discipline. That's why we rely on specialized experts with many years of experience in the electrical industry. Your benefit: one contact person at SITECO coordinates your entire project.

Our SITECO service team takes responsibility for your project.

- + Light audit
- + Planning & project management
- + Lighting control & field analysis
- + Masts & site infrastructure
- + Installation & commissioning
- + Maintenance & servicing

# Get in touch today and discover the quantum leap in floodlighting.



### Contact.

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