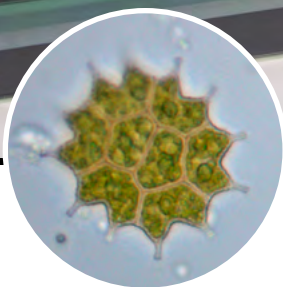
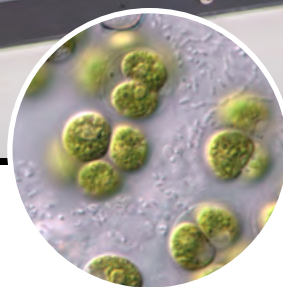


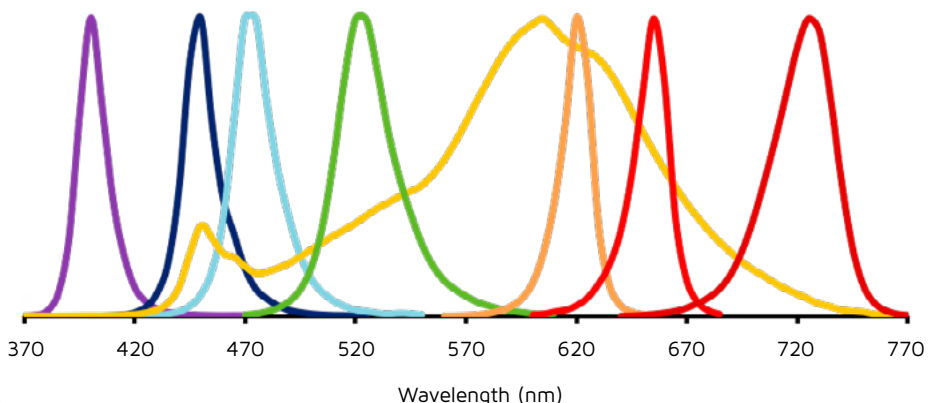
**Multichannel
Algal Cultivation**



**Biomass Accumulation
and Physiological Analysis**



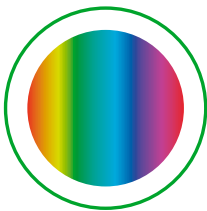
**Spectrum Selection
for Each Channel**





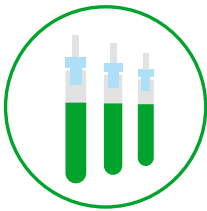
PARALLEL SCREENING

- 8 independent samples in 80 mL vessels
- Different organisms, nutrients, toxicants, etc.
- Similar or different light regimes in each channel
- Automatic OD monitoring
- Temperature control



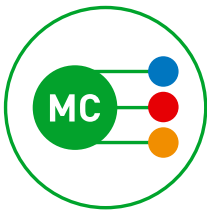
LED IRRADIANCE

- Choice of spectrum for each channel
- 405, 450, 475, warm white, 530, 615, 660, 730 nm LEDs
- Independent control of spectrum, intensity and diurnal cycle
- Total light intensity up to 2.500 $\mu\text{mol.m}^{-2}.\text{s}^{-1}$



APPLICATIONS

- Optimization of cultivation
- Light-dependent gene expression
- Light induced signaling
- Cell differentiation
- Synthesis of pigments, enzymes, proteins, metabolites
- Circadian clock regulation



ACCESSORIES

- Online Control Software
- Gas Mixing System
- Turbidostat Module
- Cooling Unit

