

EzCube Fluorometer

Illuminating Precision
with Triple Fluorescent Channels



Illuminating Precision with Triple Fluorescent Channels

EzCube Fluorometer

EzCube Fluorometer features triple fluorescent channels and offers high-sensitivity and specific quantification of nucleic acids and proteins. It accurately measures low concentration samples as small as 1 μ l, making it ideal for demanding applications, including NGS.

Combined with dedicated EzQuant quantification assays, an intuitive touchscreen and USB connectivity, EzCube simplifies your precision quantification processes and makes them easy.



Enhanced Accuracy and Sensitivity

Quantify low concentrations of DNA, RNA and protein with just 1 μ l in seconds, more sensitive than UV absorbance measurements.



Three Fluorescent Channels

Expand your application range with triple-channel detection.



Easy Operation

Seamlessly control your workflow with an intuitive 7-inch touchscreen and a built-in reagent calculator.



Flexible Data Management

USB connectivity for easy data export.



High Compatibility with Quantification Assays

EzCube fluorometer works with EzQuant quantification assays and other commonly used options.

EzQuant Quantification Assay Kits

EzQuant quantification assays are your trusted choice for dsDNA HS, ssDNA, and RNA HS detection. These assays utilize a highly specific fluorescent dye that binds precisely to the target molecule. This allows accurate quantification down to 10 pg/ μ l, even in the presence of contaminants or degraded DNA/RNA.

EzQuant quantification assays only require a 1 μ l sample and a quick 2-minute incubation to significantly enhance the efficiency of your quantification processes.

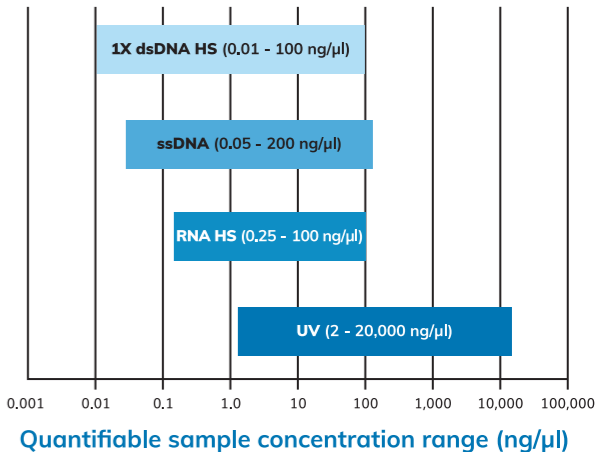


Figure 1. Quantitative initial sample concentration ranges (variable sample volume 1 - 20 μ l) for EzQuant quantification assays and UV absorbance measurements.

1X dsDNA HS (High-Sensitivity)

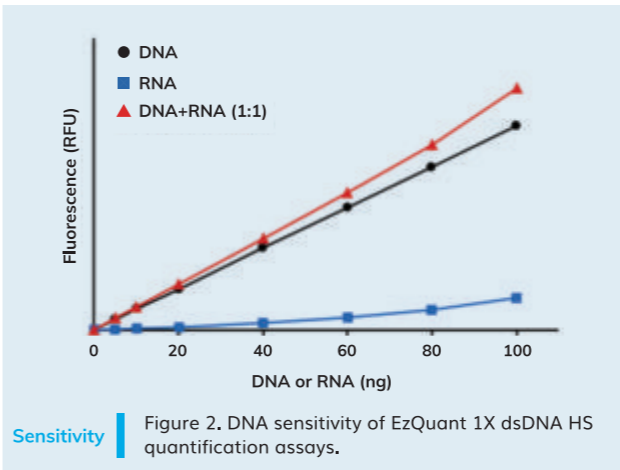


Figure 2. DNA sensitivity of EzQuant 1X dsDNA HS quantification assays.

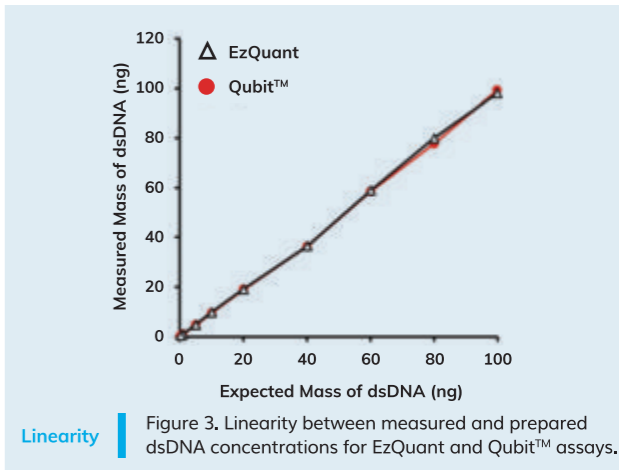


Figure 3. Linearity between measured and prepared dsDNA concentrations for EzQuant and Qubit assays.

RNA HS (High-Sensitivity)

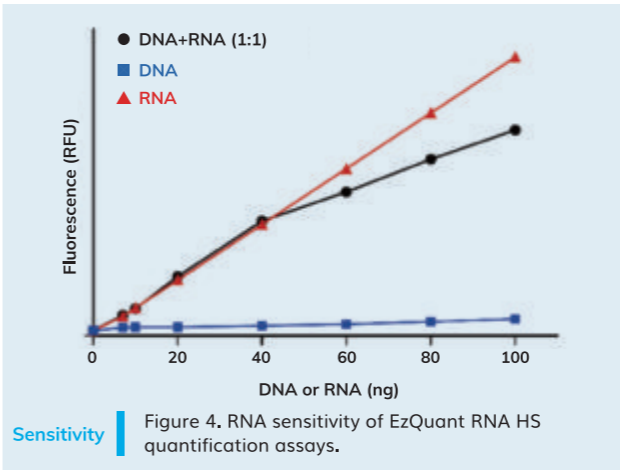


Figure 4. RNA sensitivity of EzQuant RNA HS quantification assays.

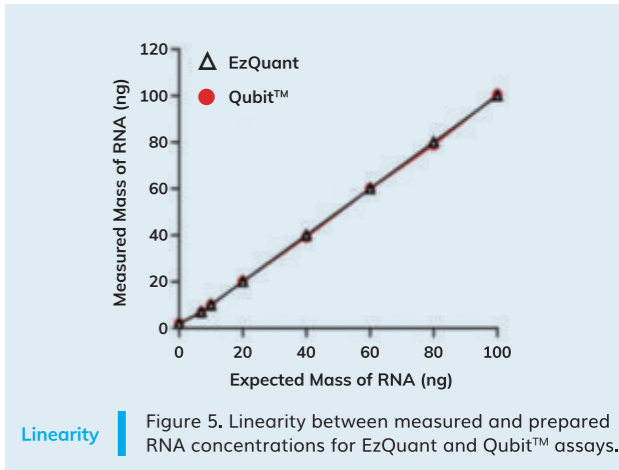


Figure 5. Linearity between measured and prepared RNA concentrations for EzQuant and Qubit assays.

Specifications

Dynamic Range	5 orders of magnitude
Measurement Time	≤ 3 seconds
Light Sources	Blue LED (max ~480 nm) Red LED (max ~630 nm) Green LED (max ~535 nm)
Excitation Filters	Blue 430 - 495 nm Red 600 - 645 nm Green 490 - 535 nm
Emission Filters	Green 510 - 580 nm Red 665 - 720 nm Yellow 564 - 650 nm
Detectors	Photodiodes; measurement capability from 320-1,100 nm
Tube Type	0.5 ml polypropylene thin wall PCR tubes
Operating System	Custom Linux based OS
Display	7" touch screen, 1,280*800 TFT-LCD
Connectivity	USB-A port x1 (Data output)
Dimensions (W x D x H)	196 mm x 248 mm x 68 mm (7.7 x 9.8 x 3.4 in.)
Weight	1 kg (2.2 lb.)
Glove Compatibility	All common lab gloves
Internal Storage	32 GB flash memory
Operating Voltage	Input: AC 100 - 240 V, 50/60 Hz; Output: DC 24 V, 2.7 A
Certifications	CE

Specifications are subject to change without prior notice.

Ordering Information

BRFP-0300	EzCube Fluorometer (Blue, Red & Green)
BRQK011-010000 (T00-FPBR00-00)	EzQuant 1X dsDNA HS Quantification Kit (100 Assays)
BRQK011-050000 (T00-FPBR04-00)	EzQuant 1X dsDNA HS Quantification Kit (500 Assays)
BRQK020-010000 (T00-FPBR01-00)	EzQuant ssDNA Quantification Kit (100 Assays)
BRQK031-010000 (T00-FPBR02-00)	EzQuant RNA HS Quantification Kit (100 Assays)
BRQK100-050000 (T00-FPBR03-00)	0.5 ml Thin Wall PCR Tube

Note:

Qubit™ is a registered trademark of Thermo Fisher Scientific and its subsidiaries. It is used here for identification and reference purposes only. Blue-Ray Biotech, its products and this document are not endorsed, authorized, or affiliated in any way with Thermo Fisher Scientific.

