



**SOLIS
BIODYNE**

INNOVATION POWERED BY NATURE

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SOLIScript[®] Lyo-ready 1-step RT-qPCR Kit

Simplify your virus detection assay without sacrificing accuracy or efficiency during lyophilization

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Features

- **Flexibility with lyophilization** – the lyo-compatible reverse transcriptase mix and DNA polymerase can be combined with either the 4x RT-qPCR Lyo Excipient Mix or opt for your own lyo- and cryoprotectants
- **Sensitive nucleic acid detection** – wide dynamic range with both **RNA and DNA targets**
- **Fast workflow – fast polymerization speed and reconstitution times** of the lyophilizate
- **Preserved performance** – the **sensitivity is consistent** even after lyophilization with primer-probe set (see Figure 1)
- Up to **5-plex** multiplexing capability
- Manufactured in compliance with **ISO 13485**

SOLIScript[®] Lyo-ready 1-step RT-qPCR Kit represents a lyo-compatible RT-qPCR solution with optimized set of excipients that is suitable for reliable **lyophilization into lyo-bead or lyo-cake**. The kit is based on SOLIScript[®] reverse transcriptase, and HOT SolisFAST[®] DNA polymerase, both *in silico* designed enzymes of exceptional functionality.

The residual moisture content of **less than 1%** allows the extension of the shelf life of the lyophilizate remarkably.

Unaffected enzyme activity – great performance is preserved after lyophilization

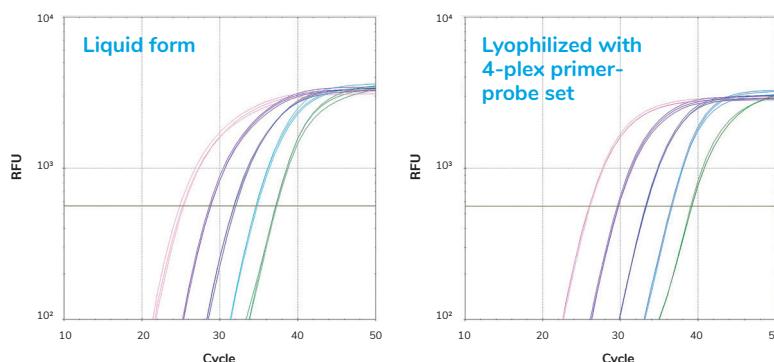


Figure 1. PPIA target from human total RNA was amplified over five 10-fold dilutions (10 ng in pink to 1 pg in green), showing sensitive detection over a wide dynamic range in a wet format and after lyophilization with primer-probe set in the VIC channel. Cycling protocol used with **SOLIScript[®] Lyo-ready 1-step RT-qPCR Kit** was the one recommended on the Data Sheet.



See next page for competitive critical temperatures

Targeting extra user convenience with flexibility

The kit works with both RNA and DNA and by that allows combining complex assays for robust amplification and makes it an ideal solution for the RNA and DNA target detection kits in the fields of human diagnostics, veterinary and agricultural testing.

The kit format is developed to provide the excipient mix separately from the lyo-compatible enzymes, which offers the flexibility to opt for other excipient combinations.

Applications

- Viral load determination in human diagnostics, veterinary and agricultural testing
- Pathogen detection
- Detection and quantification of RNA and DNA targets
- High-throughput setup

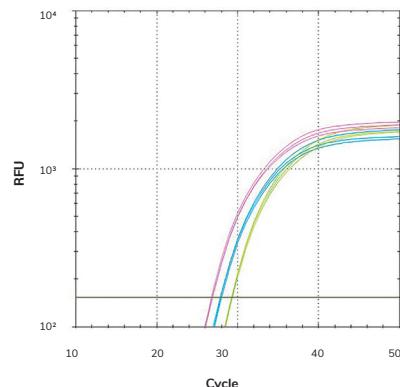


Figure 2. ALB target was amplified from human total RNA (in blue), human genomic DNA (in green) and human total RNA/human genomic DNA combined (in pink) at 0.1 ng/μl concentration in the VIC channel. Cycling protocol used with **SOLIScript® Lyo-ready 1-step RT-qPCR Kit** was 50°C 10 min, 95°C 10 min, 50 cycles of: 95°C 1 sec and 60°C 5 sec.

Competitive critical temperatures

Manufacturer	Product	Tc	Tg
Solis BioDyne	SOLIScript® Lyo-ready 1-step RT-qPCR Kit	-30 °C	85.9 °C
PB	Lyo-ready RT-qPCR Kit	-35.1 °C	68.9-81.3 °C
MB	Lyo-ready RT-qPCR Kit	-29.4 °C	45 °C

The higher the **Tc** (Collapse temperature at the drying front), the more energy-efficient is lyophilization. The higher the **Tg** (Glass transition temperature of the dried state), the higher is the recommended long-term storage temperature of the lyophilizates with a low risk of degradation. Long-term storage temperature (**Ts**) of the lyophilizates with a low risk of degradation (Hancock et. al., 1995):

$$Ts = Tg - 50 \text{ } ^\circ\text{C}$$

Ordering information

Bulk solutions available!

Product	CAT. NO.	Size	Read more
SOLIScript® Lyo-ready 1-step RT-qPCR Kit	08-92-0000S (sample) 08-92-00250 08-92-02000 08-92-05000	100 rxn (sample) 250 rxn 2000 rxn 5000 rxn	



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and ordering please contact
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