

# Complementary DNA Synthesized from *Schistosoma haematobium*, Egyptian Strain, Infected Hamster MicroRNA (chronic)

## Catalog No. NR-49139

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**Product Description:** Complementary DNA (cDNA) was synthesized from microRNA (miRNA) extracted from pooled plasma of hamsters infected for 7 weeks with *Schistosoma haematobium* (*S. haematobium*), Egyptian strain.

Lot<sup>1,2</sup>: 63190622

Manufacturing Date: 15OCT2014

TEST	SPECIFICATIONS	RESULTS
Concentration	Report results	1.0 µg in 20 µL per vial (0.05 µg/µL)
OD <sub>260</sub> /OD <sub>280</sub> Ratio	1.70 to 2.00	1.82
Quantification of miRNA by RT-PCR Fold change of parasite-derived miRNAs <sup>3,4</sup>	>2-fold change detected	>2-fold change detected (Figure 1)

<sup>1</sup>QC testing was performed by the Biomedical Research Institute, Rockville, MD (NIH-NIAID Contract HHSN2722010000051)

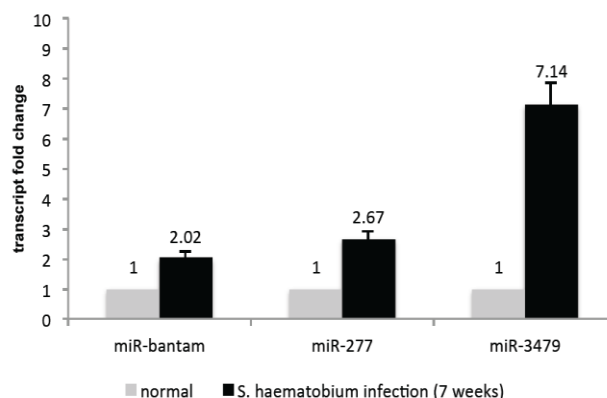
<sup>2</sup>miRNA from pooled plasma from hamsters infected 7 weeks was purified by NucleoSpin miRNA-Plasma Kit (ClonTech Laboratories, Inc.). cDNA was synthesized from the miRNA, using Mir-X™ miRNA First Strand Synthesis (ClonTech Laboratories, Inc.), according to the manufacturer's instructions.

<sup>3</sup>Real time PCR was performed using SYBR-qRT-PCR (Clontech) according to the manufacturer's instructions.

<sup>4</sup>Primers utilized for real time PCR are described in Hoy, A. M., et al. "Parasite-Derived MicroRNAs in Host Serum as Novel Biomarkers of Helminth Infection" *PLoS Negl. Trop. Dis.* 8 (2014): e2701. PubMed: 24587461.

### Figure 1: Detection of *S. haematobium* Derived miRNAs (bantam, miR-277 and miR-3479) in Pooled Hamster Plasma after 7 Weeks Parasite Infection.

miRNA was quantified by real time PCR, normalized to a synthetic RNA spike-in and the fold change was calculated as the ratio of abundance in infected plasma compared to the background abundance level detected in normal samples.



Date: 28 APR 2015

Signature:

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