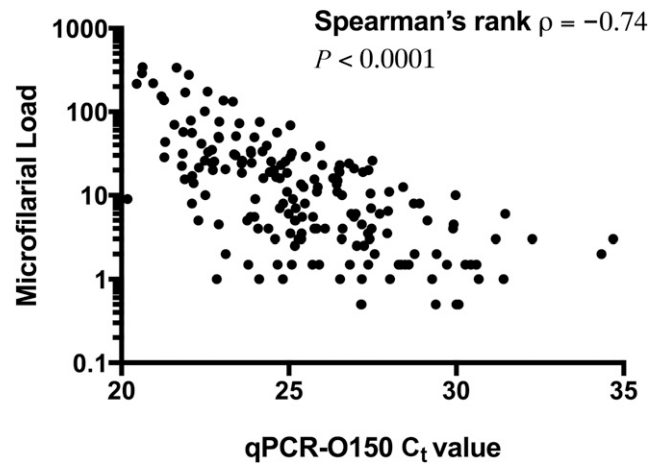


SUPPLEMENTAL FIGURE 1. Receiver operator characteristics analysis of O150-PCR ELISA OD values using the qPCR-O150 results as the gold standard comparator. The optimal threshold OD = 0.055 point on the curve is shown with a large red point along with the sensitivity and specificity of this threshold.



SUPPLEMENTAL FIGURE 2. Microfilarial loads are inversely correlated with qPCR-O150 quantification as measured by the observed cycle threshold (C_t) value (Spearman's rank correlation = -0.74 , $P < 0.0001$). The x axis depicts the average C_t value from experimental replicates of DNA from skin snips, whereas the y axis depicts the microfilarial count derived from microscopic evaluation of skin snips.

SUPPLEMENTAL TABLE 1
Summary of PCR assays for filarial DNA detection used in this study

PCR	Filarial species	Type of PCR	Target sequence	Primer sequences	Probe sequences
qPCR-O150 ¹¹	<i>Onchocerca volvulus</i>	Real-time PCR (TaqMan)	O150 repeat	F: 5'-TCGCCGTGTAA TGTGGAA-3' R: 5'-AACTGATGACCTA TGACCCTAATC-3'	5'-6-FAM-GGACCCAAT-ZEN- TCGAATGTATGTACCCGT- Iowa Black FQ quencher-3'
qPCR-MCA ¹²	Pan-filarial	Real-time PCR (EvaGreen) with MCA	ITS1-5.8S	ITS1-UNIF: 5'-GGTGwTATTC GTTGGTGTCTAT-3' 5.8S-EXTR: 5'-AGCTAGCTG CGTTCCTCAT-3'	N/A
O150-PCR ELISA ¹⁵	<i>O. volvulus</i>	Conventional PCR with ELISA-based detection	O150 repeat	1,632: 5'-GATTYTCCGRCG AANARCGC-3' 1,633 biotin: 5' biotin-GCNRT RTAAATNTGNAAATTC-3'	5'-AATCTCAAAAACGGGT ACATA-6-FAM 3'
<i>Mansonella perstans</i> qPCR ³¹	<i>M. perstans</i>	Real-time PCR (TaqMan)	ITS1	MP ITS1 Forward: 5'-AGGATC ATTAACGAGCTTCC-3' MP ITS1 Reverse: 5'-CGAATAT CACCGTTAATTCAGT-3'	5'-6-FAM-TTCACTTTTATTT AGCAACATGCA-BHQ1-3'
<i>Loa loa</i> qPCR ³²	<i>L. loa</i>	Real-time PCR (TaqMan)	ORF LLMF72	LLMF72 Forward: 5'-CGGAAGA CTCAACGTCAGAAATCA-3' LLMF72 Reverse: 5'-AGGAACG CTTGATGGTGATGT-3'	5'-6-FAM-CCAACAGCCTG CTTTT-BHQ1-3'

MCA = melt curve analysis.