

Apollo 324 Library Preparation for Next Generation Sequencing

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Apollo 324

- Capable of high sample throughput, 48-samples
- Works with gDNA, cDNA, total RNA, mRNA, ribo-depleted RNA, small RNA



Protocols for

- Sample Prep: Ribo-Depletion or Poly(A) mRNA
- Stranded RNA Library Prep for ILM
- Nugen's SPIA technology
- Utility protocols: post-PCR purification
- Library prep for other sequencing platforms

Ribo-Zero™ and Globin-Zero™ Kit Selection Guide

[Ribo-Zero™: Selection Guide](#) | [Species Compatibility](#) | [FAQs](#)

The Ribo-Zero™ rRNA Removal Kits and the Globin-Zero™ rRNA/globin mRNA Removal Kit set the standard for ribosomal RNA (rRNA) and globin mRNA removal for RNA-Seq sample prep.

Ribo-Zero treated and Globin-Zero treated RNA can be used to make whole transcriptome RNA-Seq libraries using Epicentre's [ScriptSeq™ v2 RNA-Seq Library Preparation kit](#).

The Ribo-Zero and Globin-Zero Kits:

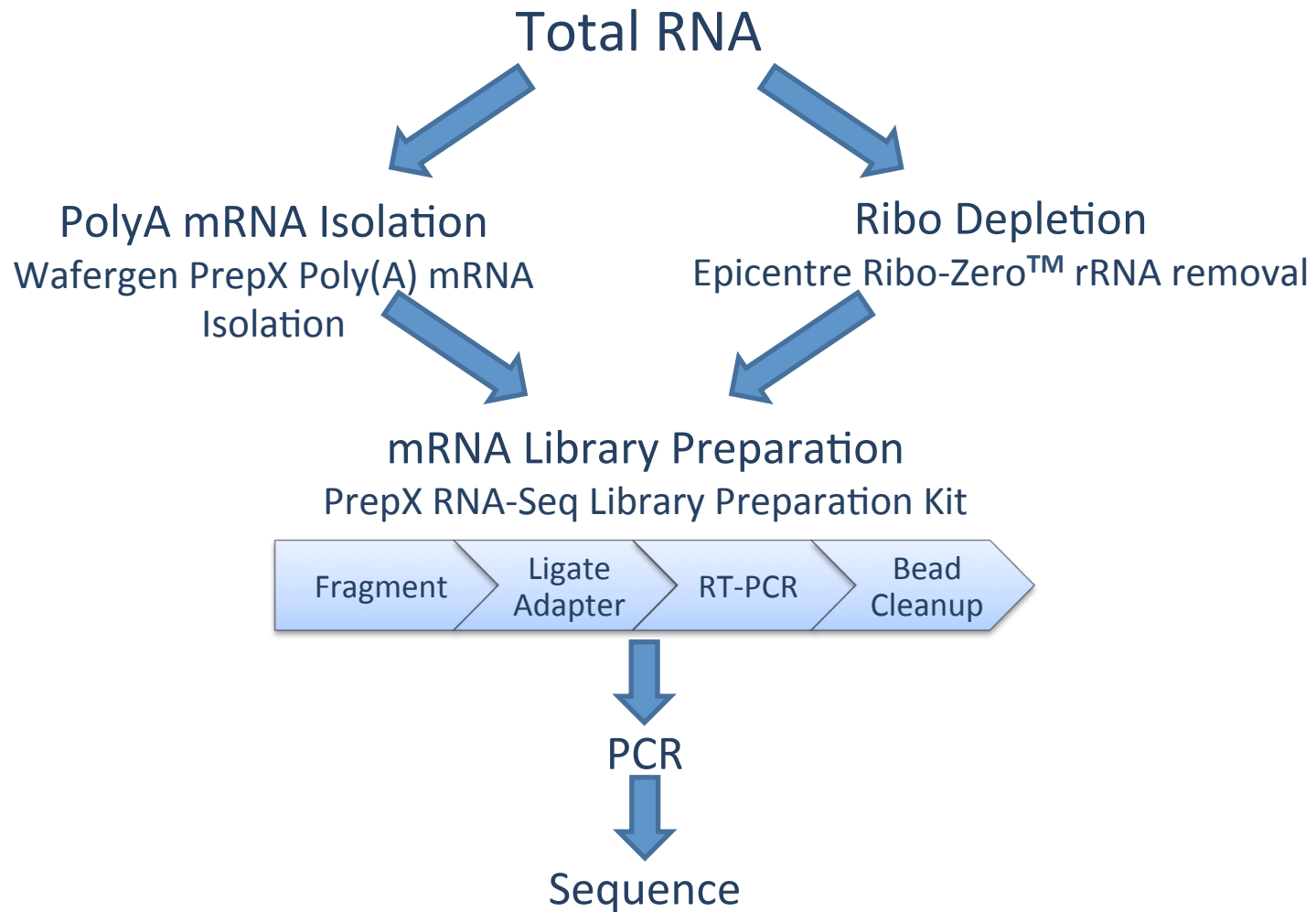
- Utilize intact, degraded and formalin-fixed, paraffin-embedded (FFPE) RNA samples.
- Enrich for mRNA and non-rRNA non-coding RNA for whole transcriptome RNA-Seq.
- Utilize an automation-friendly magnetic bead process.
- Can be used with RNA from a wide variety of species.

Don't see your organism?
Find Your RNA Companion



RNA Sample	Kit	Removes Euk. Cytoplasmic rRNA	Removes Mitochondrial rRNA	Removes Bacterial rRNA	Removes Chloroplast rRNA	Removes Globin mRNA
Human and other animal species and FFPE RNA	Ribo-Zero™ Magnetic Kit (Human/Mouse/Rat)	✓				
Human and other animal species; FFPE RNA	Ribo-Zero™ Magnetic Gold Kit (Human/Mouse/Rat)	✓	✓			
Human microbiome and other bacteria-infected human, mouse, rat samples	Ribo-Zero™ Magnetic Gold Kit (Epidemiology)	✓	✓	✓		
Bacteria (mixed populations of gram-negative and gram-positive bacteria)	Ribo-Zero™ Magnetic Kit (Bacteria)			✓		
Gram-negative bacteria	Ribo-Zero™ Magnetic Kit (Gram-Negative Bacteria)			✓		
Gram-positive bacteria	Ribo-Zero™ Magnetic Kit (Gram-Positive Bacteria)			✓		
Plant leaf tissue	Ribo-Zero™ Magnetic Kit (Plant Leaf)	✓	✓		✓	
Plant seed or root tissue	Ribo-Zero™ Magnetic Kit (Plant Seed/Root)	✓	✓		✓	
Mammalian blood RNA	Globin-Zero™ Gold Kit	✓	✓			✓
Yeast	Ribo-Zero™ Magnetic Kit (Yeast)	✓	✓			

Automated workflow for Total RNA to cDNA



Apollo 324 Automated Library Prep

Starting Material	Minimum Starting Amount ng	Preferred Maximum Starting Amount ng	Maximum Sample Volume in Water ul	PrepX Protocol Script	Produces	Directional Library	Ready to Use	Notes
gDNA / cDNA	<= 0.5*	300	15	ILM	Illumina library	No	Yes	adaptor-ligated, ready to use
total RNA	2	10	5	SPIA RNA Seq	cDNA	No	No	Uses Nugen SPIA technology (http://www.nugen.com), then PrepX ILM DNA
mRNA	0.1	250	16	mRNA Directional	Illumina library	Yes	No	Custom IDT adaptor-ligation required post-Apollo
ribosomal-depleted total RNA	10	50	16	mRNA Directional	Illumina library	Yes	No	Custom IDT adaptor-ligation required post-Apollo

SPIA RNA-Seq

- Total RNA to cDNA
- Compatible with the SPIA technology
 - Low amounts of total RNA, 2 -10 ng
 - Degraded RNA
 - oligo-dT selection and random primers designed with human and mouse compatibility
- PrepX ILM DNA Kit for library construction

Expanding 3rd Party Applications

- New Additions



- Coming Soon



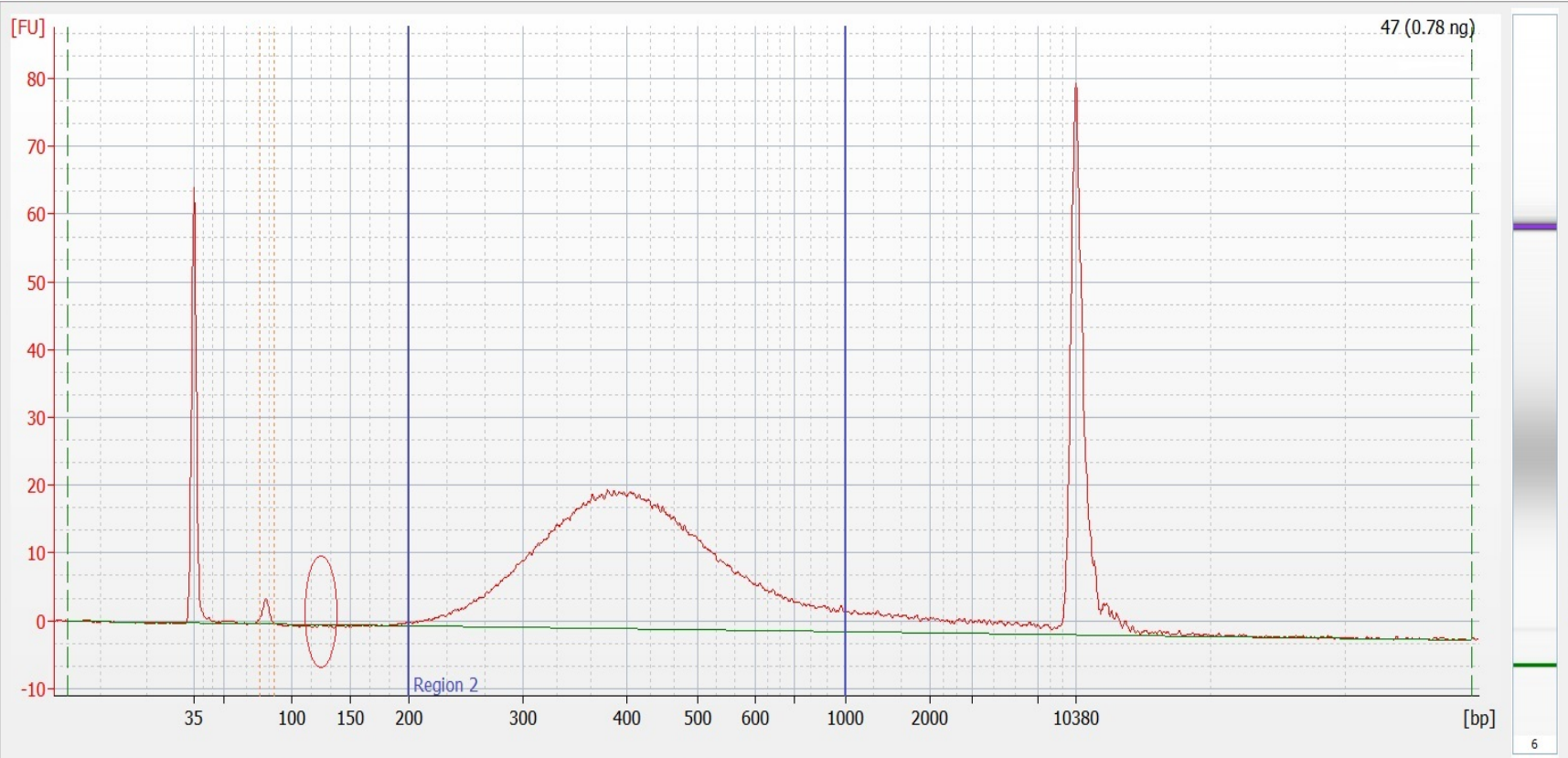
TruSeq Stranded Total RNA v2



TruSeq Nano

- Custom scripting services from Wafergen

Library Quality



	From [bp]	To [bp]	Corr. Area	% of Total	Average Size [bp]	Size distribution in CV [%]	Conc. [pg/μl]	Molarity [pmol/l]	Color
1	76	88	4.4	1	81	2.8	8.54	159.9	Orange
▶	200	1,000	432.0	89	433	30.2	590.17	2,293.1	Blue

Questions?

Sample preparation
Fee for service
Training

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