



# Pillar<sup>®</sup> ONCO/Reveal<sup>™</sup> Multi-Cancer v4 with CNV Panel

The ONCO/Reveal Multi-Cancer v4 with CNV Panel is a robust NGS assay that interrogates genes of interest\* across multiple solid tumor cancer types. The assay uses proprietary Stem-Loop Inhibition-Mediated amplification (SLIMamp<sup>®</sup>) technology, a tiled amplicon-based library prep chemistry for efficient single-tube target enrichment. In addition to SNVs and indels, the assay detects CNVs in 14 genes.

## ONCO/Reveal Multi-Cancer v4 with CNV Panel (60 genes)

ABL1	CDKN2A	FBXW7	GNAS	KIT●	NPM1	PTPN11	SRC
AKT1	CSF1R	FGFR1●	HNF1A	KRAS●	NRAS	RAC1	STK11
ALK	CTNNB1	FGFR2●	HRAS	MAP2K1	NTRK1	RB1	TP53
APC	DDR2	FGFR3●	IDH1	MET▲	NTRK2	RET	VHL
ATM	EGFR▲	FLT3●	IDH2	MLH1	NTRK3	ROS1	
BRAF	ERBB2▲	FOXL2	JAK2	MPL	PDGFRA●	SMAD4	
CCNE1●	ERBB4	GNA11	JAK3	MYC▲	PIK3CA●	SMARCB1	
CDH1	EZH2	GNAQ	KDR●	NOTCH1	PTEN	SMO	

CNVs detected and verified by NIST reference standard are indicated by ▲  
CNVs can also be detected in genes indicated by ●

### Simple NGS library prep workflow

Maintain control of samples and results with single-tube, tiled amplification that can be performed in-house by any NGS lab

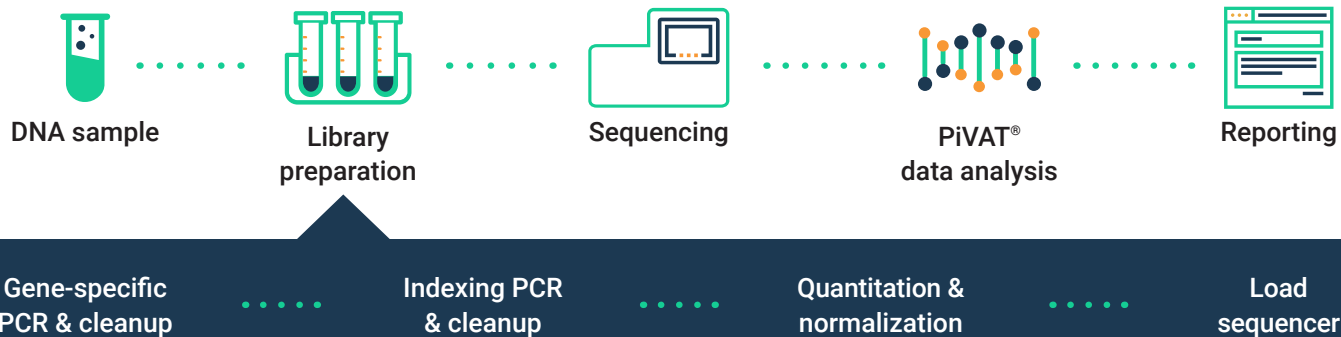
### Sensitive and robust chemistry

Achieve variant detection as low as 1% VAF<sup>†</sup> without UID<sup>‡</sup>s even with limited DNA input or poor sample quality

### Reduced fully-loaded lab costs

Improve lab efficiency and reduce “no calls”, repeat testing, and difficult interpretation decisions

## Simple, one-day workflow



\*Content is based on data from ongoing clinical trials along with sources that include the College of American Pathologists (CAP), the Association for Molecular Pathology (AMP), the National Comprehensive Cancer Network (NCCN), and the Catalog of Somatic Mutations in Cancer (COSMIC) database.

<sup>†</sup>VAF, variant allele frequency; <sup>‡</sup>UID, unique ID; also known as unique molecular ID (UMI)

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## Panel specifications

Enrichment chemistry	Multiplex PCR using tiled amplicons
<b>Number of pools</b>	<b>1 pool</b>
Number of genes/amplicons	60/341
Number of targets	Hotspots in 60 genes; CNVs for 14 genes
Variant types	SNVs, small and medium indels, and CNVs
Average amplicon size	125bp (range 86bp – 185bp)
Recommended DNA input range	5ng to 80ng
Sample types	DNA from tissue or blood; FFPE
Mapping rate	99.3% ± 0.3%
% on-target aligned reads	99.5% ± 0.1 %
Coverage uniformity (% targets with >0.2X mean coverage)	98.2% ± 0.7%
Total assay time (from DNA to sequencer)	<8 hours
Sequencing platforms	Illumina®, MGISEQ™ and Ion Torrent™ platforms

## Ordering information

Select the panel AND one of the index kit options listed below.

Panel	Part number
ONCO/Reveal Multi-Cancer v4 with CNV Panel	HDA-HS-1002-24

Pillar Index Kit options	Part number
Pillar Kit A, indices PI501-8, PI701-4 (32 combinations)	IDX-PI-1001-96
Pillar Kit B, indices PI501-8, PI705-8 (32 combinations)	IDX-PI-1002-96
Pillar Kit C, indices PI501-8, PI709-12 (32 combinations)	IDX-PI-1003-96
Pillar Kit D, indices PI501-8, PI701-12 (96 combinations)	IDX-PI-1004-192
Pillar Kit E, indices PI501-8, PI701-12 (96 combinations)	IDX-PI-1004-384

Ion Torrent Index Kit options	Part number
Pillar Biosciences IonXpress Indexing Kit A (24 combinations) <i>Includes ION Common Index</i>	IDX-TI-1001-96

MGI Index Kit options	Part number
Pillar Biosciences MGI Indexing Kit A (24 combinations) <i>Includes BGI Common Index</i>	IDX-BI-1001-96

Order or learn more at  
[pillar-biosciences.com](http://pillar-biosciences.com)

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