EXO-NET[®] PAN-EXOSOME CAPTURE

PRODUCT INFORMATION



EXO-NET Pan-Exosome Capture is a magnetic beadbased immunoaffinity EV capture device, where a 3dimensional antibody matrix is constructed on a carbon nanoparticle. The complement of antibodies attached to the bead has been designed to capture a wide range of extracellular vesicles (EVs, including exosomes) from different cell types (pan-EV capture). EXO-NET is designed for On-Bead Analysis of captured nanoparticles and ON-Bead lysis for downstream analysis of EV-associated molecules including proteins, oligonucleotides (mRNAs and microRNAs) and lipids. EXO-NET also can be tuned to preferentially isolate EVs from specific cell types. EXO-NET is a scalable EV isolation solution for high throughput screening.

EXO-NET Pan-Exosome Capture Characteristics

Speed	15 minutes from sample to EV isolation
Compatibility	With downstream EV-associated analyte analyses including RT- qPCR, Western Blot, ELISA, LC/MS and NGS.
Purity and Specificity	Proprietary 3D affinity matrix for improved purity and specificity.
Scalability	Customizability and scalability for isolation of enriched exosomes
Versatile	For use with any biofluid sample

EXO-NET[®] Pan-exosome – Simply Workflow

EXO-NET[®] Pan-Exosome Capture Superior EV Yield

EXO-NET Pan-Exosome Capture isolates more nanoparticles from normal human plasma*, than other commercially available bead-based kits tested (Kit A and B below), as measured by nanoparticle tracking analysis using ZetaView). The concentration of nanoparticles remaining in the input sample after EV isolation was reduced to < 20% using EXO-NET compared to >30% with the other kits.

Depletion of human plasma nanoparticles



^{*}plasma was centrifuged at 10,000 g before EV isolation: Commercially available kits (Exosome Isolation Kit Pan, human - Milteni and Plasma/Serum Exosome Purification and RNA Isolation Mini Kit, Norgen. Data are presented as the mean ± SEM (n= 3).



High Purity EV Protein

EXO-NET captured EVs from pooled normal human plasma showed present of EV known protein markers CD63, CD81, CD9, Flotillin-1, and TSG101.



Reduced Apolipoprotein contamination

EXO-NET not only outperformed other EV isolation kits regarding the enrichment of EV associated marker such as Flotillin-1 (Panel A). EXO-NET EV lysates



have less co-isolated contaminates (*e.g.*, ApoB, Panel B) when compared to other EV isolation kits (lanes #1, #2 and #3). Source: INOVIQ Collaborator Data

Reduced Contamination by Plasma Proteins

Mass spectrometry analysis of plasma EV-lysates indicates that EXO-NET reduces album contamination by more than half when compared to the other commercially available kits tested. Source: INOVIQ Collaborator Data



High Yield EV miRNA and mRNA

Overview of miRNAs (upper panel A) and mRNAs (lower panel B) yield and recovery using EXO-NET Pan-exosome and 4 other commercially available EV isolation kits (A, B, C, D) were assayed by RT-qPCR for miRNAs miR-16, let-7a and miR-21 and mRNA for GAPDH, OAZ1, RPLPO and SERF2. EXO-NET results in equivalent or higher recovery of plasma EV RNA compared to other 4 EV isolation kits as indicated by a lower CT value.





Product ordering information

Cat No.	Product Name	Isolations	Size	
40031	EXO-NET Pan-Exosome Capture	60	1.0mL	
40033	EXO-NET Pan-Exosome Capture	30	0.5mL	
40036	EXO-NET Pan-Exosome Capture	15	0.25mL	
Number of isolations based on 15 ul; EXO-NET per sample				

Contact Information

To learn more about EXO-NET® visit

EXO-NET (inoviq.com/site/products/exo-net-pan-exosome) or email info@inoviq.com.

