**Supplementary Information**

**Supplemental Table 1. Proteins with increased levels in mutant KRAS cancer-derived EVs and their oncogenic properties.**

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| Proteins | Families | Oncogenic properties | References |
| KRAS | Ras GTPase | Mutant KRAS promotes cancers by:   1. Regulating various signalling axes such as:    1. MAPK signalling.    2. PI3K signalling. 2. Promoting proliferation. 3. Promoting survival. 4. Suppressing cell death. | [56] |
| NF1 | Ras GTPase | * Promotes cancer by inhibiting host anticancer immunity by impairing the antitumour activity of type 1 natural killer T-cells. * Suppresses cancer by negatively regulating Ras signalling. | [56] |
| ARID1A | Chromatin remodelling protein | Regulating PI3K and p53 signalling axes and suppresses tumour by:   1. Regulating genomic stability. 2. Regulating cell cycle progression. | [56] |
| MSH2 | DNA mismatch repair related protein | * Regulating DNA damage-induced apoptosis. * Suppresses tumour by enhancing DNA mismatch repair. | [56] |
| CTNNB1 | β1-catenin | * T-cell factor (TCF) / lymphoid enhancer factor (LEF) mediated target gene transcription. * Promotes cancer by regulating multiple cancer related signalling e.g. Canonical Wnt signalling. | [56] |
| PI3KR1 | Regulatory subunit of phosphatidylinositol 3-kinase (PI3K) | Activating PI3K/mTOR/Akt signalling axis to promote cancer proliferation, survival and metastasis. | [56] |
| Ago2 | Essential component for RISC | Involved in post-transcriptional regulation of gene expression. Promotes cancer by:   1. Assisting in KRAS signalling. 2. Regulating biogenesis of pro-tumour miRNAs. | [63] |
| Amphiregulin | Ligand for EGFR | Promotes cancer by:   1. Promoting autocrine proliferative signalling 2. Assisting in oestrogen signalling. 3. Triggering cancer metastasis | [69] |
| Rab13 | Ras related protein | Regulates cellular localization and trafficking of proteins. Promotes cancer by:   1. Increasing surface expression and activation of GLUT4 glucose transporter. 2. Enhancing EGFR signalling axis. 3. Promoting angiogenesis. 4. Promoting cancer migration and invasion through:    1. Disrupting tight junction formation.    2. Regulating migration and scattering of cancer cells. | [44] |
| GLUT1 | Glucose transporters | Overexpressed in various cancers. Promotes cancer by:   1. Increasing glucose influx and utilization. 2. Protecting against glucose deprivation-induced stress. 3. Enhancing proliferation. | [116] |