

APEX TISSUE CANCER SPECIFIC PANEL DETAILS

APEX Tissue Lung	<p>Somatic alterations in 16 genes:</p> <ul style="list-style-type: none"> ALK, BRAF inclusive of V600E, EGFR inclusive of L858R, ex19del, ex20ins, T790M, C797S with cis/trans info, ERBB2/HER2, KEAP1, KRAS inclusive of G12C, MET ex14skipping + amplification, NRG1, NTRK1, NTRK2, NTRK3, ROS1, RET, SMARCA4, STK11
APEX Tissue Breast	<p>Somatic alterations in 18 genes:</p> <ul style="list-style-type: none"> AKT1, BRAF inclusive of V600E, CDK4, CDKN2A, EGFR, ERBB2/HER2, ESR1, FGFR1, MAP2K1, MTOR, NTRK1, NTRK2, NTRK3, PIK3CA, PTEN, RB1, RET
APEX Tissue Colorectal	<p>Somatic alterations in 15 genes:</p> <ul style="list-style-type: none"> ALK, BRAF inclusive of V600E, ERBB2/HER2, FGFR1, KRAS exons 2-4 inclusive of G12C, NRAS exons 2-4, NTRK1, NTRK2, NTRK3, PIK3CA, POLE, PTEN, RET, ROS1
APEX Tissue GIST	<p>Somatic alterations in 10 genes:</p> <ul style="list-style-type: none"> BRAF inclusive of V600E, ERBB2/HER2, FGFR1, KIT, NTRK1, NTRK2, NTRK3, PDGFRA inclusive of D842V, RET
APEX Tissue Cholangiocarcinoma/Biliary tract/Gallbladder	<p>Somatic alterations in 12 genes:</p> <ul style="list-style-type: none"> BRAF inclusive of V600E, ERBB2/HER2, FGFR2, IDH1, KRAS inclusive of G12C, MET, NTRK1, NTRK2, NTRK3, PIK3CA, RET
APEX Tissue Melanoma	<p>Somatic alterations in 12 genes:</p> <ul style="list-style-type: none"> BRAF inclusive of V600E/K, ERBB2/HER2, HRAS, KIT, KRAS, NRAS, MAP2K1, NTRK1, NTRK2, NTRK3, RET
APEX Tissue Pancreas	<p>Somatic alterations in 17 genes:</p> <ul style="list-style-type: none"> ALK, BRAF inclusive of V600E, CDKN2A, EGFR, ERBB2/HER2, FGFR1, FGFR2, FGFR3, KRAS inclusive of G12C, MET, NRG1, NTRK1, NTRK2, NTRK3, RET, ROS1
APEX Tissue Thyroid	<p>Somatic alterations in 18 genes:</p> <ul style="list-style-type: none"> ALK, BRAF inclusive of V600E, CDKN2A, EGFR, ERBB2/HER2, FGFR2, HRAS, KIT, KRAS, NRAS, NTRK1, NTRK2, NTRK3, PIK3CA, RET, ROS1, STK11
APEX Tissue Endometrial	<p>Somatic alterations in 16 genes:</p> <ul style="list-style-type: none"> ALK, BRAF inclusive of V600E, CDK4, ERBB2/HER2, ESR1, FGFR2, KRAS, NTRK1, NTRK2, NTRK3, PIK3CA, POLE, PTEN, RET, SMARCA4
APEX Tissue Small bowel	<p>Somatic alterations in 9 genes:</p> <ul style="list-style-type: none"> BRAF inclusive of V600E, ERBB2/HER2, KRAS inclusive of G12C, NTRK1, NTRK2, NTRK3, POLE, RET
APEX Tissue Stomach/Gastric	<p>Somatic alterations in 9 genes:</p> <ul style="list-style-type: none"> BRAF inclusive of V600E, EGFR, ERBB2/HER2, MET, NTRK1, NTRK2, NTRK3, RET
APEX Tissue Bladder/Urothelial	<p>Somatic alterations in 8 genes:</p> <ul style="list-style-type: none"> BRAF inclusive of V600E, ERBB2/HER2, FGFR3 mut + fusion, NTRK1, NTRK2, NTRK3, RET
APEX Tissue CNS/Brain	<p>Somatic alterations in 11 genes:</p> <ul style="list-style-type: none"> BRAF inclusive of V600E + fusion, ERBB2/HER2, H3-3A, IDH1, IDH2, NTRK1, NTRK2, NTRK3, RET, TERT promoter

APEX TISSUE v.2 GENE LIST

Base substitutions, insertions and deletions:

AKT1, AKT2, AKT3, ALK, AR, ARAF, BRAF, CDK4, CDKN2A, CHEK2, CTNNB1, EGFR, ERBB2, ERBB3, ERBB4, ESR1, FGFR1, FGFR2, FGFR3, FGFR4, FLT3, GNA11, GNAQ, GNAS, HRAS, IDH1, IDH2, KIT, KRAS, MAP2K1, MAP2K2, MET, MTOR, NRAS, NTRK1, NTRK2, NTRK3, PDGFRA, PIK3CA, PTEN, RAF1, RET, ROS1, SMO, TP53, STK11, KEAP1, POLE, H3-3A, FOXL2, TERT, RB1, SMARCA4

Amplifications and losses:

ALK, AR, CD274 (PD-L1), CDKN2A, EGFR, ERBB2, ERBB3, FGFR1, FGFR2, KRAS, MET, PIK3CA, PTEN

Fusions:

Inter-genic: ALK, BRAF, ESR1, FGFR1, FGFR2, FGFR3, MET, NRG1, NTRK1, NTRK2, NTRK3, NUTM1, RET, ROS1, RSPO2, RSPO3.

Intra-genic: AR, BRAF, EGFR, MET