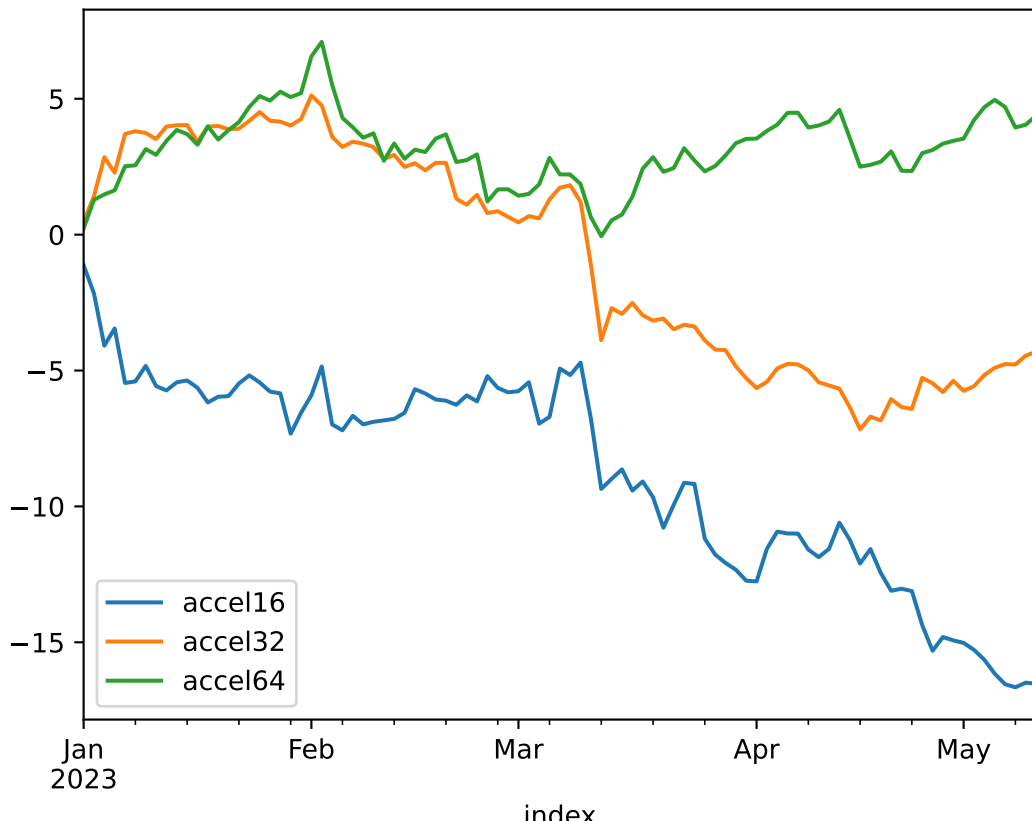
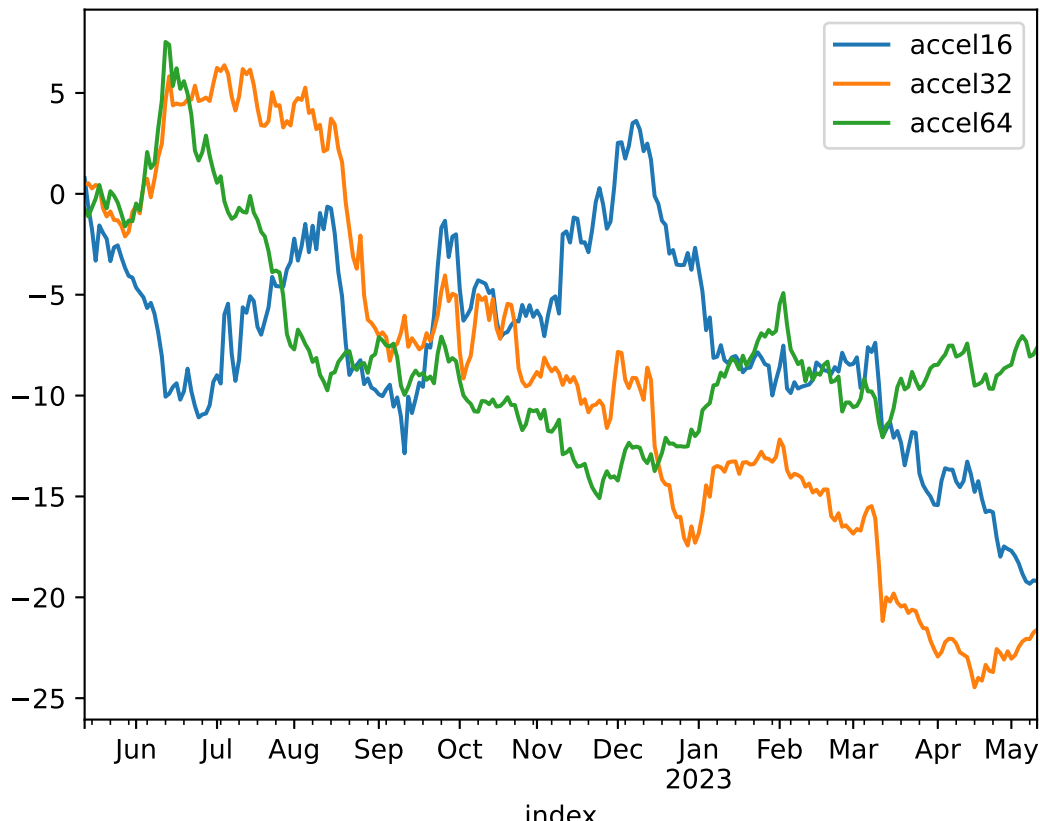


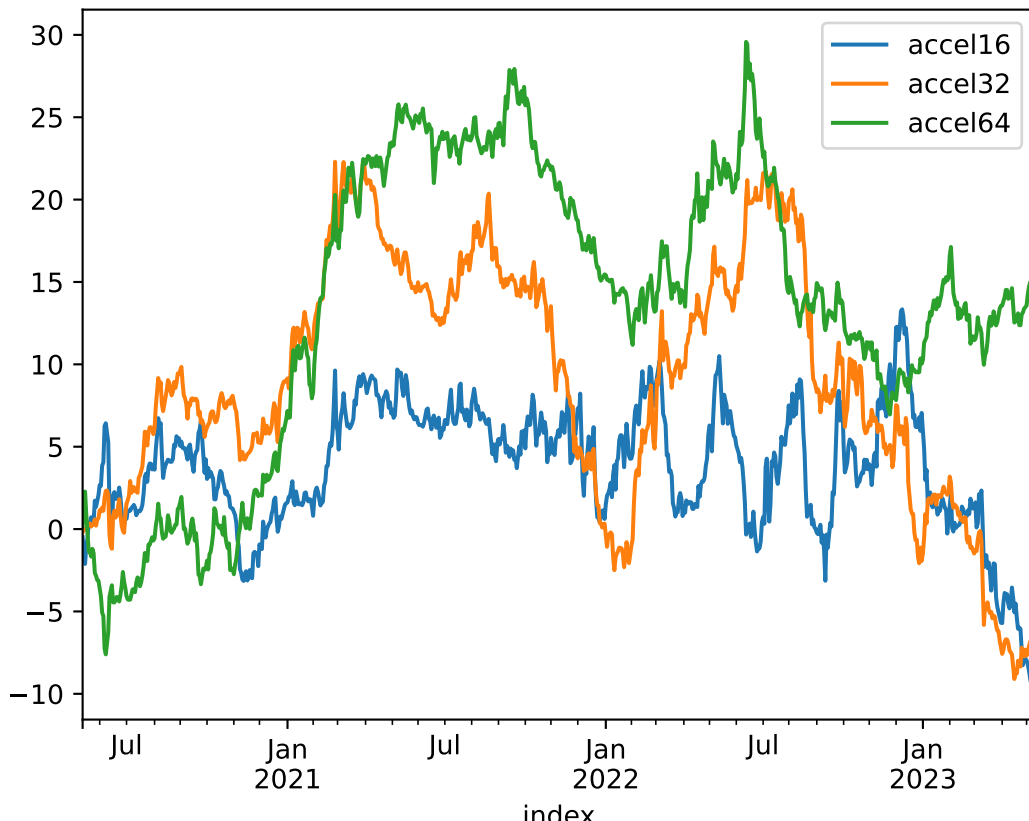
Total Trading Rule P&L for period 'YTD'
ann. mean {'accel16': -45.491, 'accel32': -11.864, 'accel64': 12.059}
ann. std {'accel16': 12.458, 'accel32': 9.758, 'accel64': 9.173}
ann. SR {'accel16': -3.65, 'accel32': -1.22, 'accel64': 1.31}



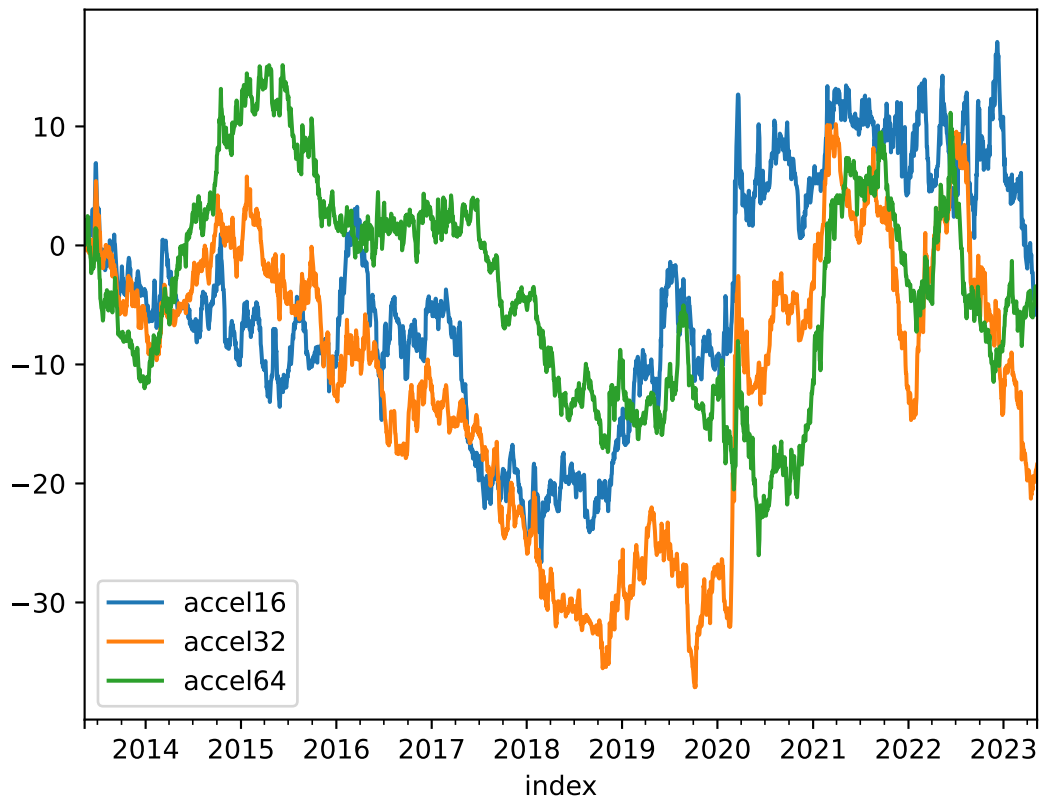
Total Trading Rule P&L for period '1Y'
ann. mean {'accel16': -18.903, 'accel32': -21.273, 'accel64': -7.511}
ann. std {'accel16': 15.743, 'accel32': 12.81, 'accel64': 10.286}
ann. SR {'accel16': -1.2, 'accel32': -1.66, 'accel64': -0.73}



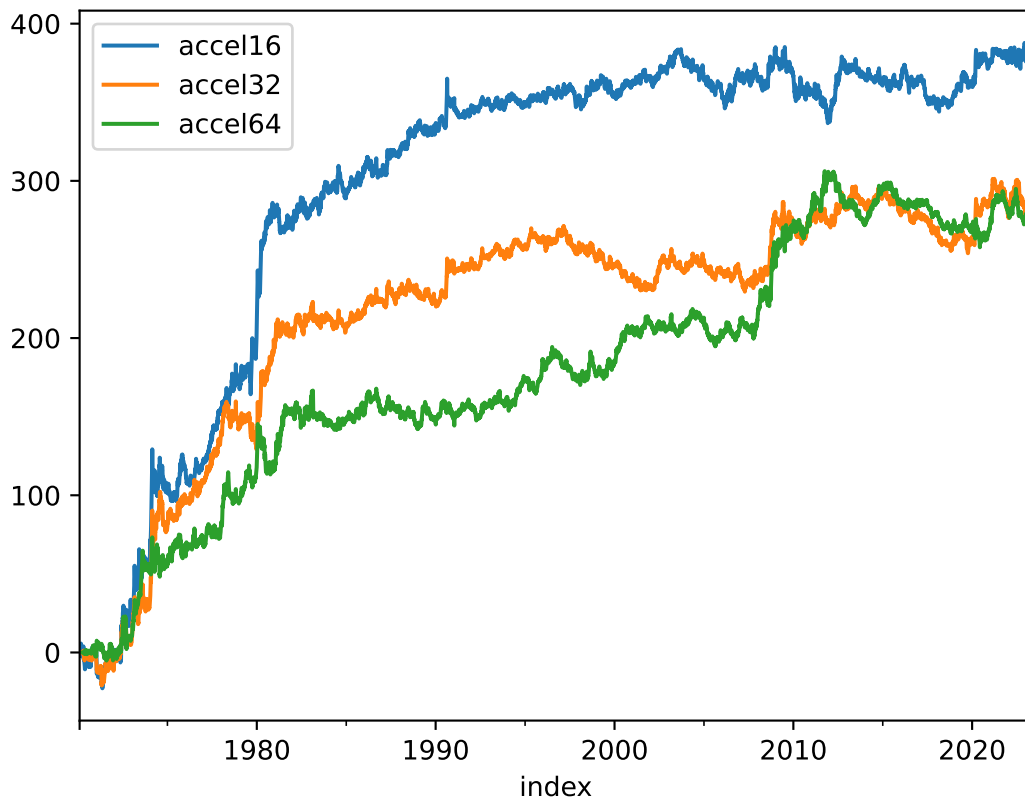
Total Trading Rule P&L for period '3Y'
ann. mean {'accel16': -3.102, 'accel32': -2.045, 'accel64': 4.718}
ann. std {'accel16': 13.536, 'accel32': 11.727, 'accel64': 10.51}
ann. SR {'accel16': -0.23, 'accel32': -0.17, 'accel64': 0.45}



Total Trading Rule P&L for period '10Y'
ann. mean {'accel16': -0.561, 'accel32': -1.808, 'accel64': -0.394}
ann. std {'accel16': 11.692, 'accel32': 10.658, 'accel64': 9.327}
ann. SR {'accel16': -0.05, 'accel32': -0.17, 'accel64': -0.04}



Total Trading Rule P&L for period '99Y'
ann. mean {'accel16': 6.723, 'accel32': 5.023, 'accel64': 5.154}
ann. std {'accel16': 14.126, 'accel32': 12.45, 'accel64': 12.1}
ann. SR {'accel16': 0.48, 'accel32': 0.4, 'accel64': 0.43}

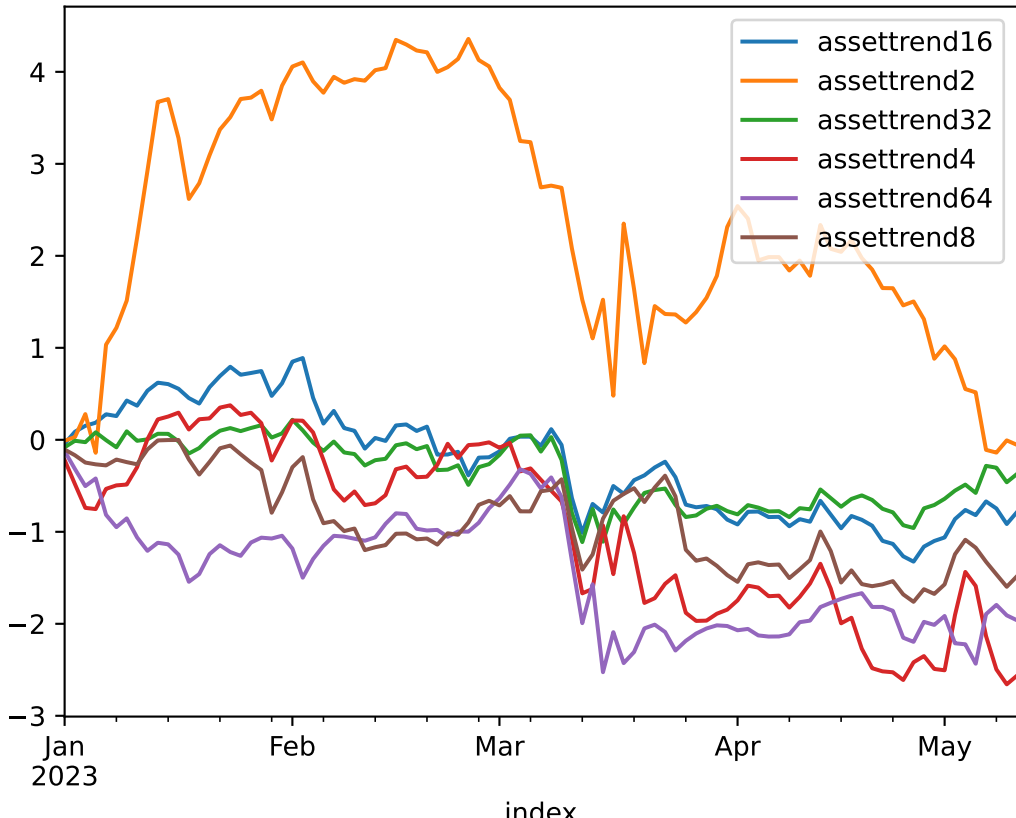


Total Trading Rule P&L for period 'YTD'

ann. mean {'assettrend16': -2.159, 'assettrend2': -0.153, 'assettrend32': -1.02, 'assettrend4': -7.055, 'assettrend64': -5.402, 'assettrend8': -4.078}

ann. std {'assettrend16': 2.493, 'assettrend2': 6.372, 'assettrend32': 2.28, 'assettrend4': 3.841, 'assettrend64': 3.381, 'assettrend8': 2.853}

ann. SR {'assettrend16': -0.87, 'assettrend2': -0.02, 'assettrend32': -0.45, 'assettrend4': -1.84, 'assettrend64': -1.6, 'assettrend8': -1.43}

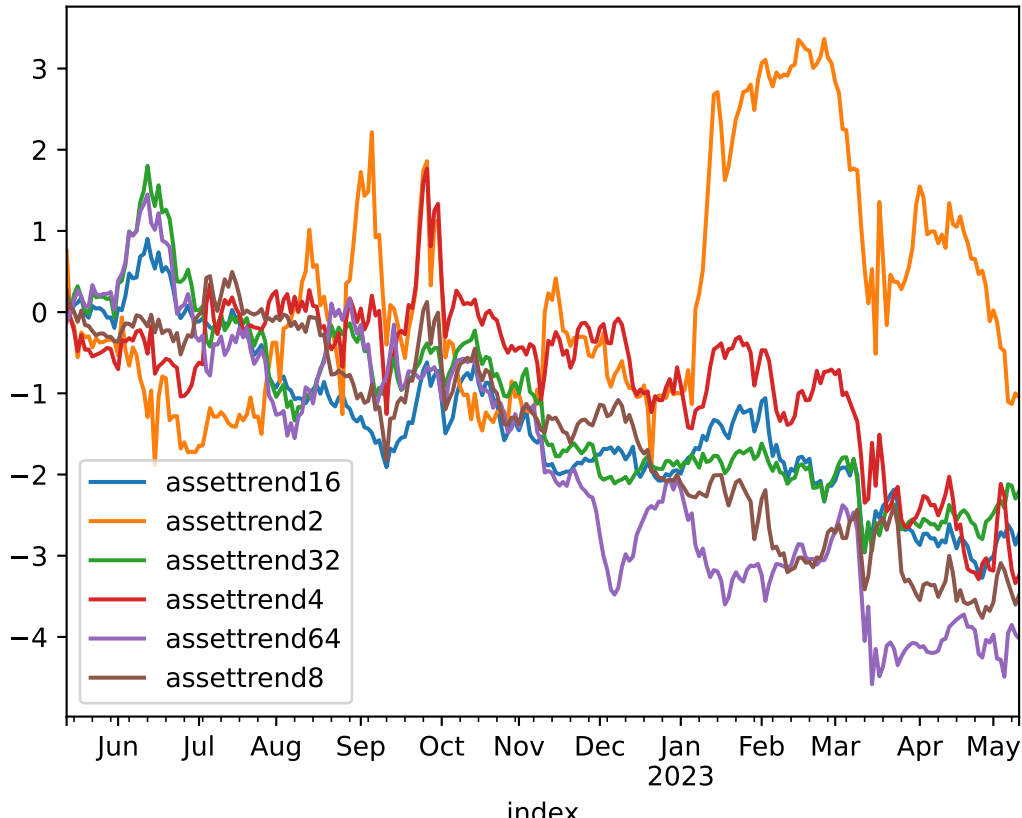


Total Trading Rule P&L for period '1Y'

ann. mean {'assettrend16': -2.69, 'assettrend2': -1.033, 'assettrend32': -2.172, 'assettrend4': -3.192, 'assettrend64': -3.958, 'assettrend8': -3.432}

ann. std {'assettrend16': 2.223, 'assettrend2': 6.217, 'assettrend32': 2.474, 'assettrend4': 3.953, 'assettrend64': 3.116, 'assettrend8': 2.65}

ann. SR {'assettrend16': -1.21, 'assettrend2': -0.17, 'assettrend32': -0.88, 'assettrend4': -0.81, 'assettrend64': -1.27, 'assettrend8': -1.29}

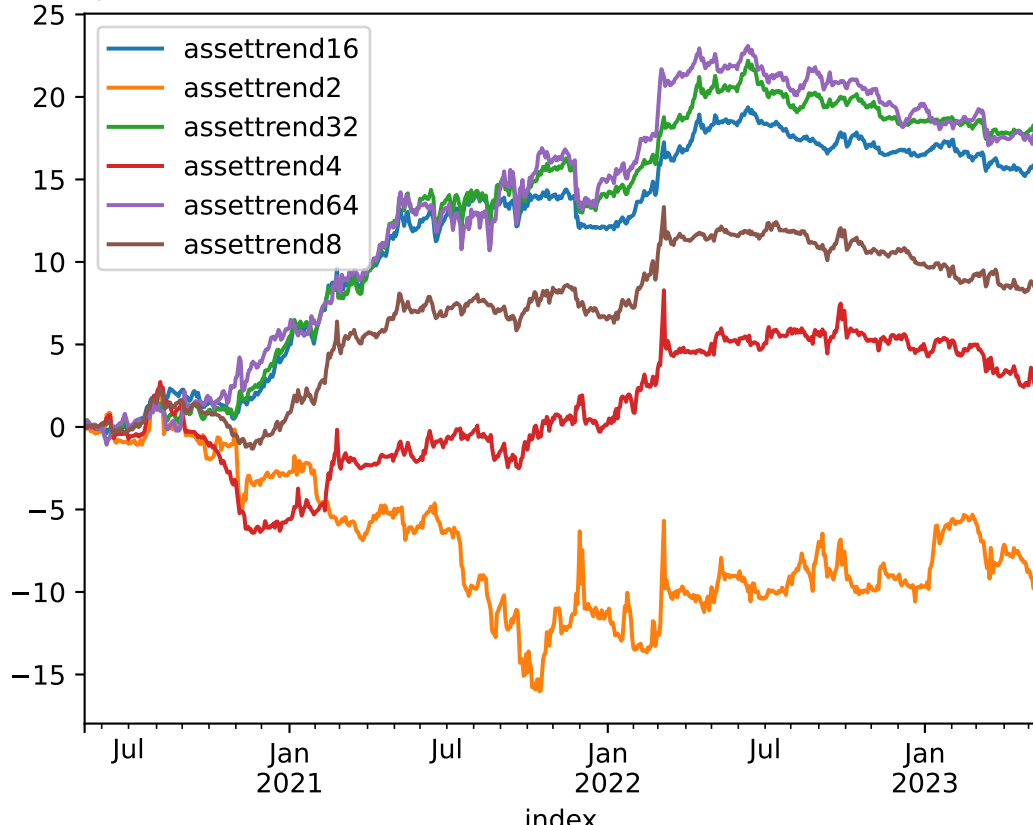


Total Trading Rule P&L for period '3Y'

ann. mean {'assettrend16': 5.153, 'assettrend2': -3.185, 'assettrend32': 5.956, 'assettrend4': 0.808, 'assettrend64': 5.769, 'assettrend8': 2.763}

ann. std {'assettrend16': 3.411, 'assettrend2': 7.81, 'assettrend32': 4.125, 'assettrend4': 4.979, 'assettrend64': 5.012, 'assettrend8': 3.527}

ann. SR {'assettrend16': 1.51, 'assettrend2': -0.41, 'assettrend32': 1.44, 'assettrend4': 0.16, 'assettrend64': 1.15, 'assettrend8': 0.78}

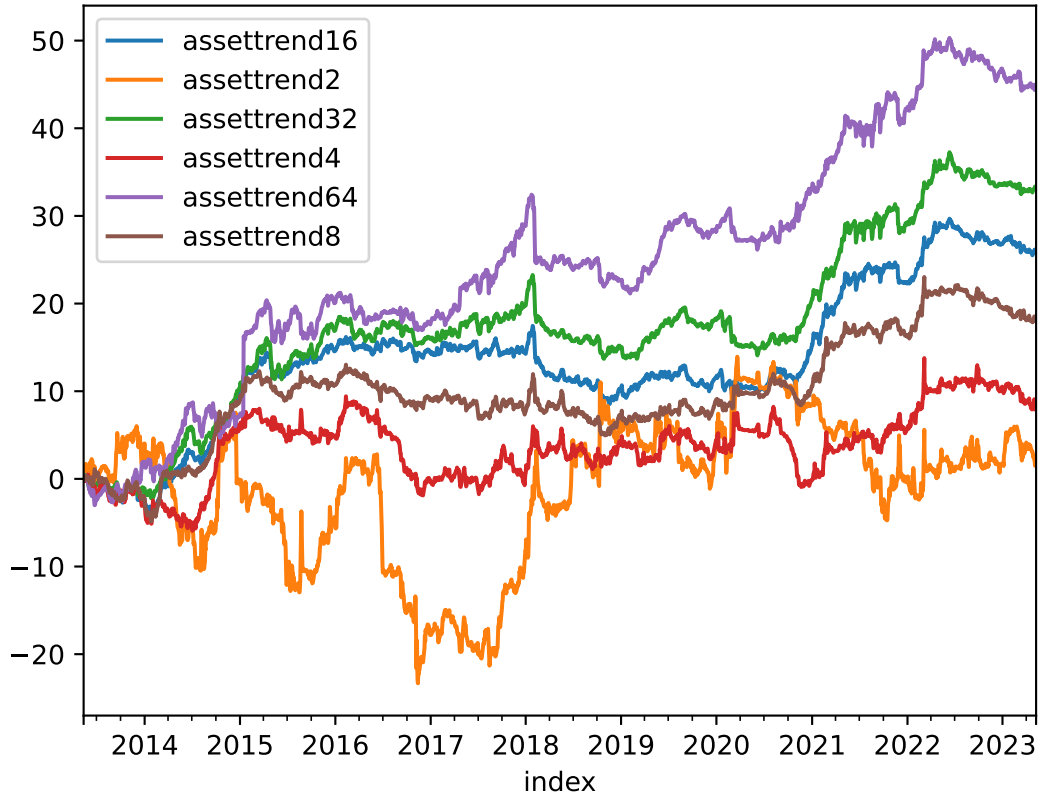


Total Trading Rule P&L for period '10Y'

ann. mean {'assettrend16': 2.557, 'assettrend2': 0.153, 'assettrend32': 3.265, 'assettrend4': 0.781, 'assettrend64': 4.401, 'assettrend8': 1.781}

ann. std {'assettrend16': 3.149, 'assettrend2': 9.769, 'assettrend32': 3.586, 'assettrend4': 4.977, 'assettrend64': 5.191, 'assettrend8': 3.45}

ann. SR {'assettrend16': 0.81, 'assettrend2': 0.02, 'assettrend32': 0.91, 'assettrend4': 0.16, 'assettrend64': 0.85, 'assettrend8': 0.52}

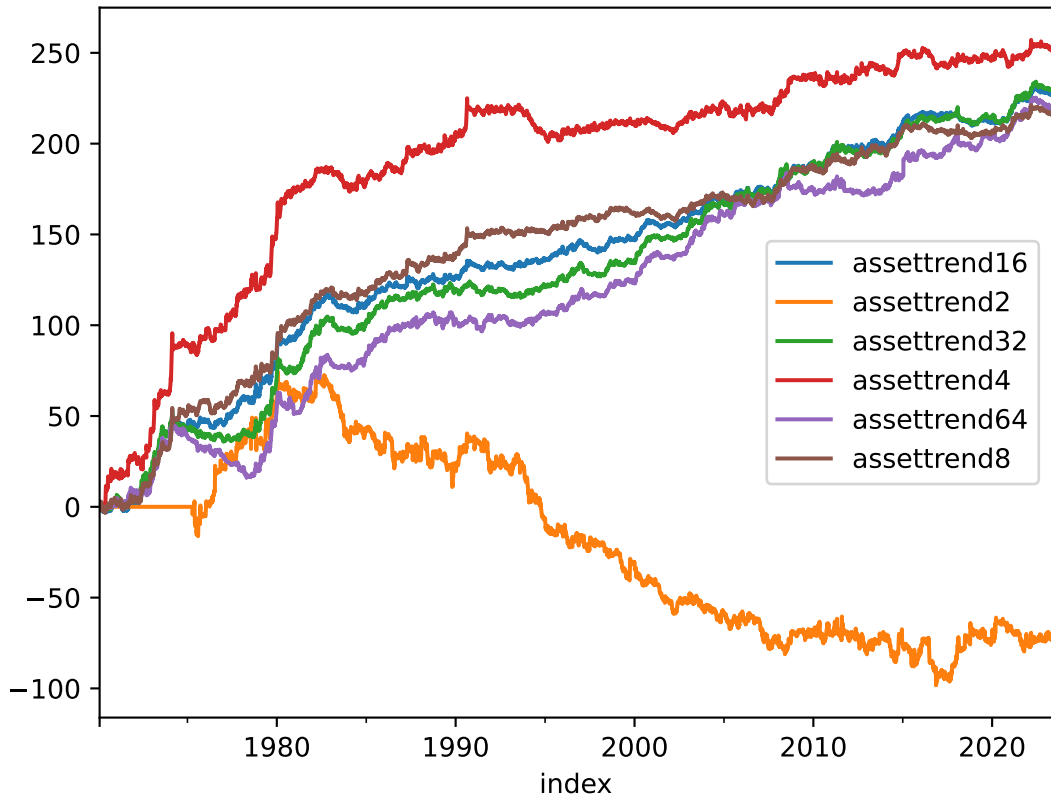


Total Trading Rule P&L for period '99Y'

ann. mean {'assettrend16': 4.187, 'assettrend2': -1.352, 'assettrend32': 4.239, 'assettrend4': 4.629, 'assettrend64': 4.05, 'assettrend8': 3.984}

ann. std {'assettrend16': 4.302, 'assettrend2': 10.256, 'assettrend32': 4.493, 'assettrend4': 6.546, 'assettrend64': 4.994, 'assettrend8': 4.632}

ann. SR {'assettrend16': 0.97, 'assettrend2': -0.13, 'assettrend32': 0.94, 'assettrend4': 0.71, 'assettrend64': 0.81, 'assettrend8': 0.86}

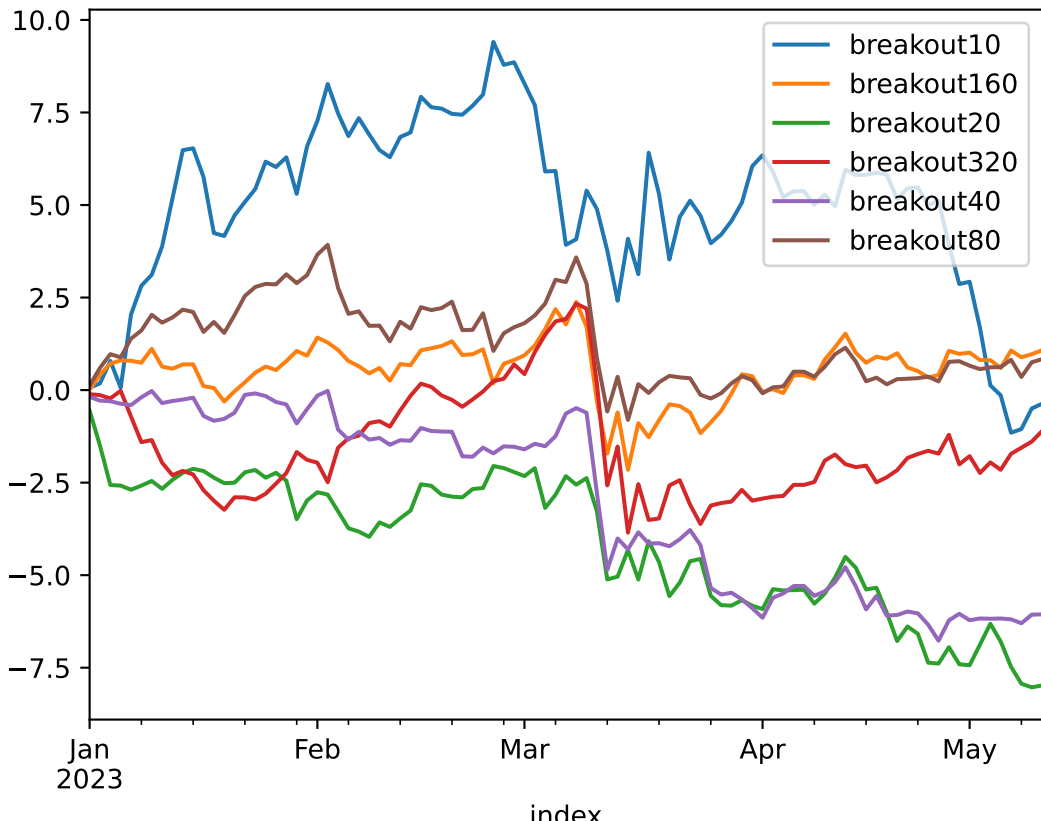


Total Trading Rule P&L for period 'YTD'

ann. mean {'breakout10': -1.012, 'breakout160': 2.963, 'breakout20': -21.967, 'breakout320': -3.048, 'breakout40': -16.676, 'breakout80': 2.302}

ann. std {'breakout10': 13.914, 'breakout160': 7.558, 'breakout20': 7.691, 'breakout320': 9.295, 'breakout40': 7.049, 'breakout80': 7.58}

ann. SR {'breakout10': -0.07, 'breakout160': 0.39, 'breakout20': -2.86, 'breakout320': -0.33, 'breakout40': -2.37, 'breakout80': 0.3}

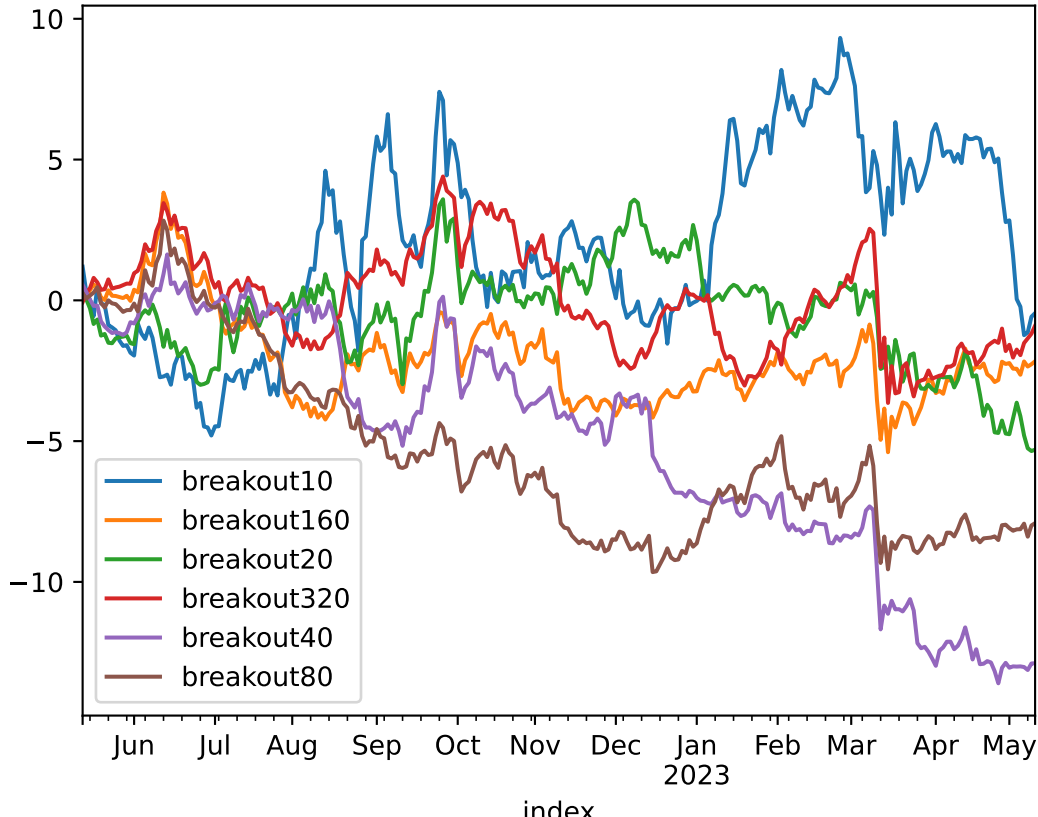


Total Trading Rule P&L for period '1Y'

ann. mean {'breakout10': -0.446, 'breakout160': -2.13, 'breakout20': -5.221, 'breakout320': -0.888, 'breakout40': -12.69, 'breakout80': -7.791}

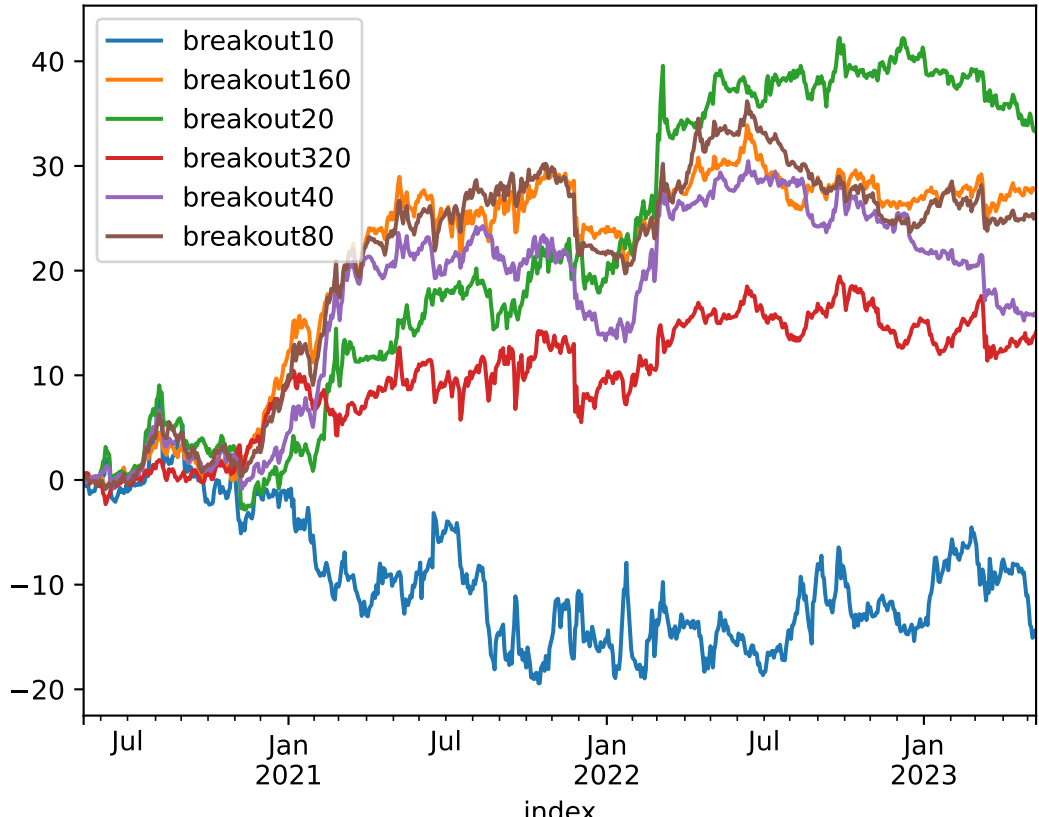
ann. std {'breakout10': 13.268, 'breakout160': 6.878, 'breakout20': 8.41, 'breakout320': 7.531, 'breakout40': 7.097, 'breakout80': 6.497}

ann. SR {'breakout10': -0.03, 'breakout160': -0.31, 'breakout20': -0.62, 'breakout320': -0.12, 'breakout40': -1.79, 'breakout80': -1.2}



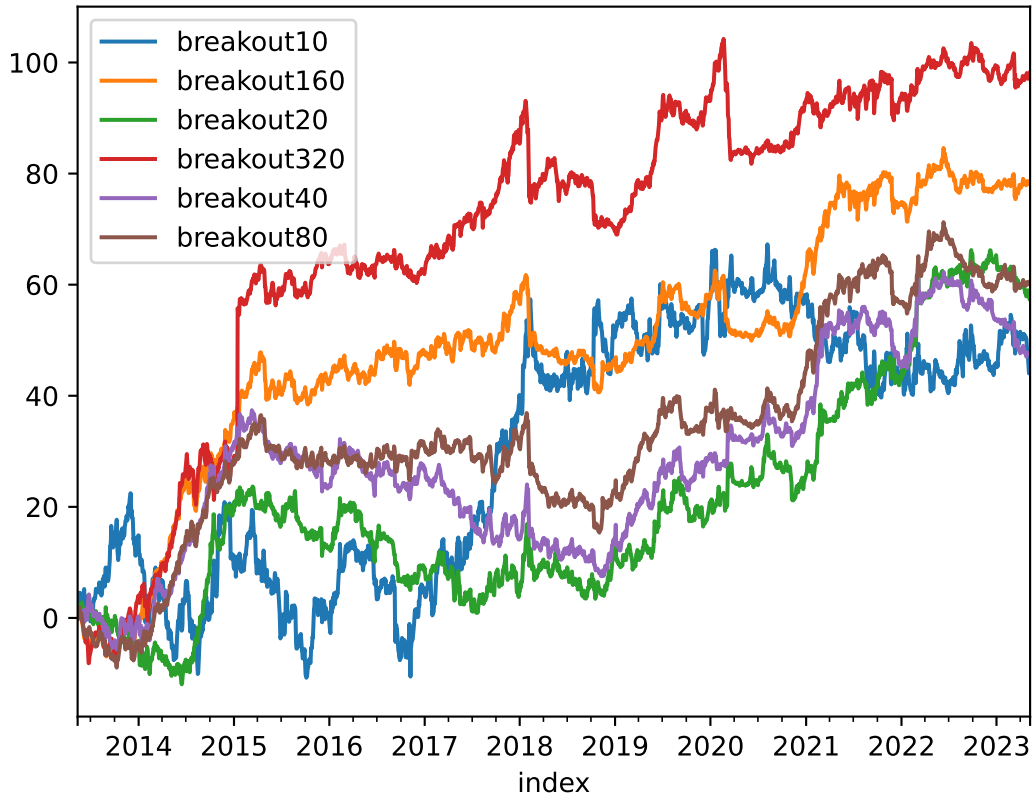
Total Trading Rule P&L for period '3Y'

ann. mean {'breakout10': -4.681, 'breakout160': 9.136, 'breakout20': 10.914, 'breakout320': 4.628, 'breakout40': 5.219, 'breakout80': 8.328}
 ann. std {'breakout10': 15.085, 'breakout160': 9.182, 'breakout20': 11.068, 'breakout320': 9.913, 'breakout40': 9.477, 'breakout80': 8.909}
 ann. SR {'breakout10': -0.31, 'breakout160': 0.99, 'breakout20': 0.99, 'breakout320': 0.47, 'breakout40': 0.55, 'breakout80': 0.93}



Total Trading Rule P&L for period '10Y'

ann. mean {'breakout10': 4.399, 'breakout160': 7.717, 'breakout20': 5.628, 'breakout320': 9.64, 'breakout40': 4.685, 'breakout80': 5.939}
ann. std {'breakout10': 17.804, 'breakout160': 8.862, 'breakout20': 11.071, 'breakout320': 13.083, 'breakout40': 9.358, 'breakout80': 8.714}
ann. SR {'breakout10': 0.25, 'breakout160': 0.87, 'breakout20': 0.51, 'breakout320': 0.74, 'breakout40': 0.5, 'breakout80': 0.68}

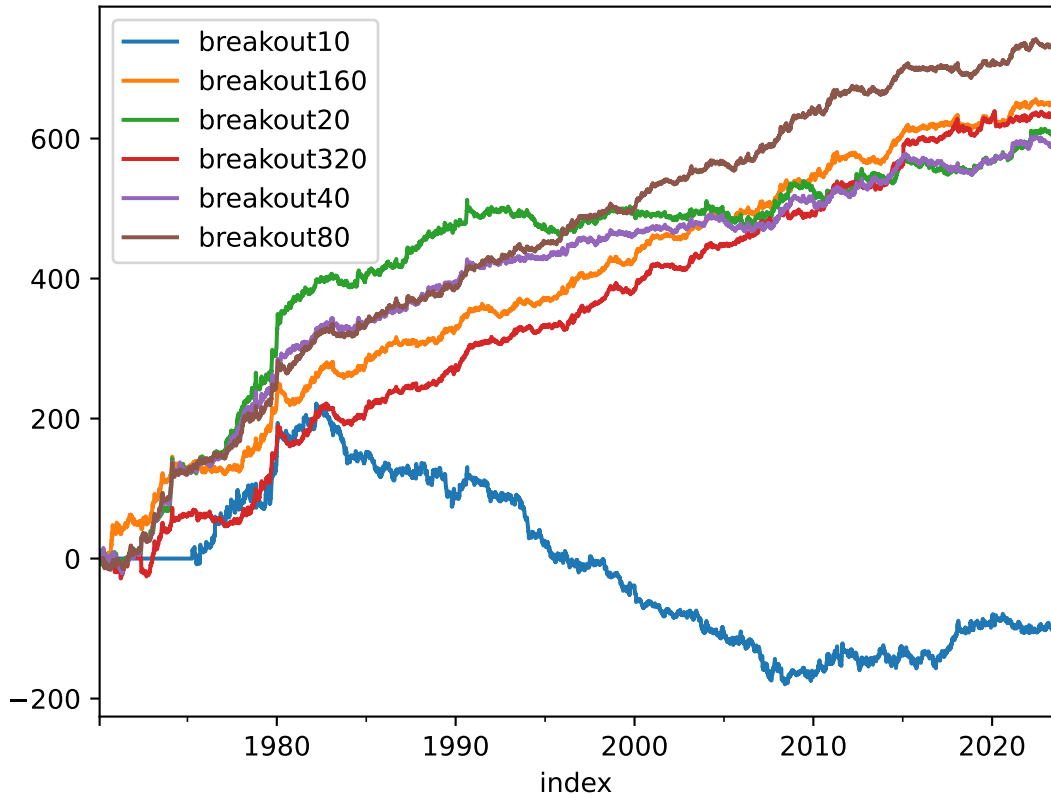


Total Trading Rule P&L for period '99Y'

ann. mean {'breakout10': -1.868, 'breakout160': 11.98, 'breakout20': 11.144, 'breakout320': 11.663, 'breakout40': 10.836, 'breakout80': 13.477}

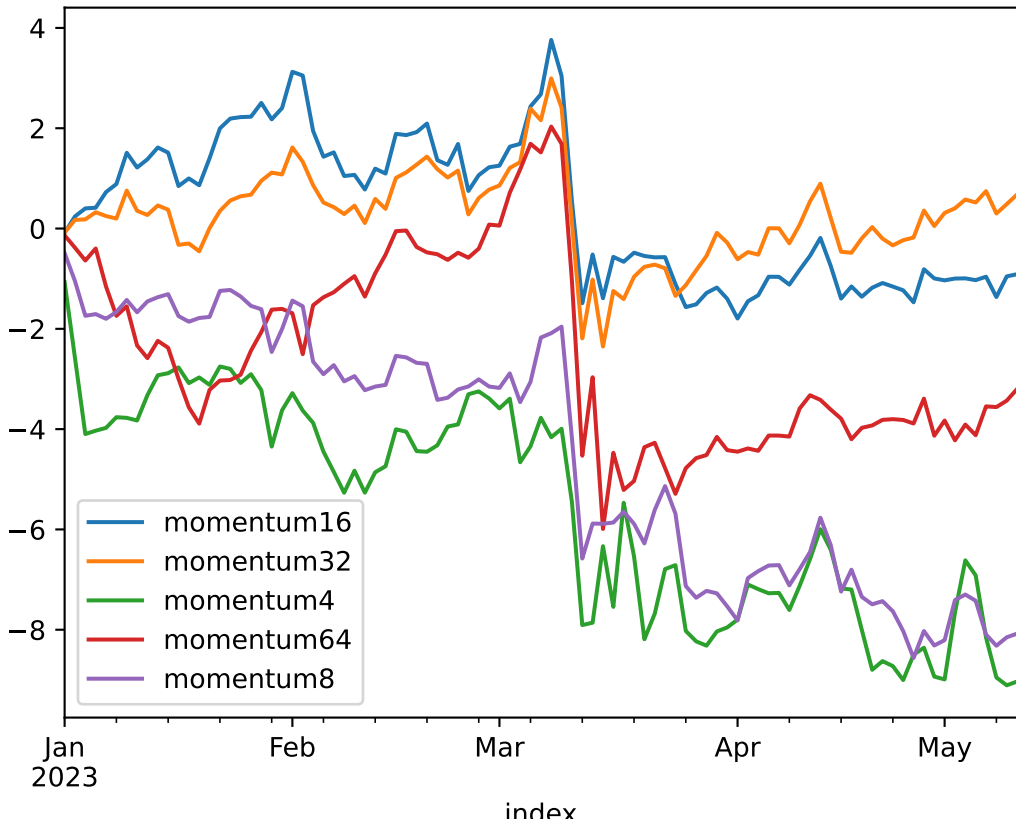
ann. std {'breakout10': 21.314, 'breakout160': 11.525, 'breakout20': 14.886, 'breakout320': 12.111, 'breakout40': 12.107, 'breakout80': 11.713}

ann. SR {'breakout10': -0.09, 'breakout160': 1.04, 'breakout20': 0.75, 'breakout320': 0.96, 'breakout40': 0.9, 'breakout80': 1.15}



Total Trading Rule P&L for period 'YTD'

ann. mean {'momentum16': -2.506, 'momentum32': 1.867, 'momentum4': -24.865, 'momentum64': -8.808, 'momentum8': -22.235}
ann. std {'momentum16': 8.423, 'momentum32': 8.432, 'momentum4': 11.211, 'momentum64': 11.309, 'momentum8': 8.546}
ann. SR {'momentum16': -0.3, 'momentum32': 0.22, 'momentum4': -2.22, 'momentum64': -0.78, 'momentum8': -2.6}

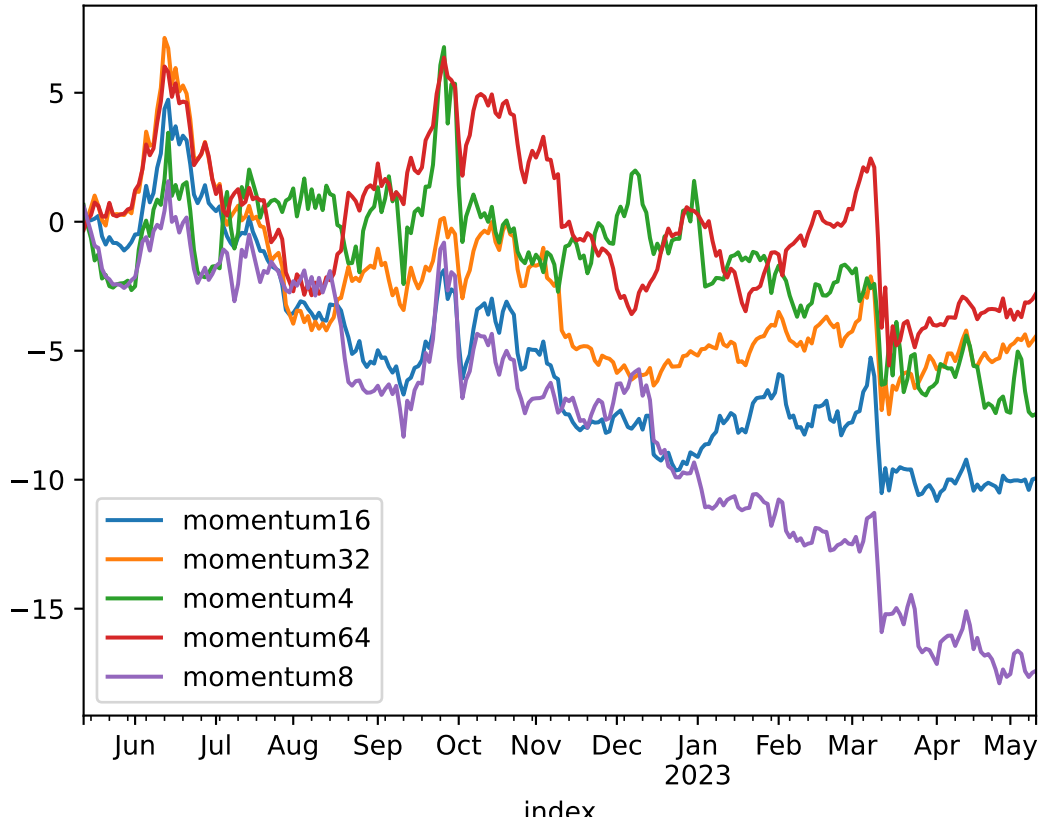


Total Trading Rule P&L for period '1Y'

ann. mean {'momentum16': -9.788, 'momentum32': -4.364, 'momentum4': -7.334, 'momentum64': -2.736, 'momentum8': -17.138}

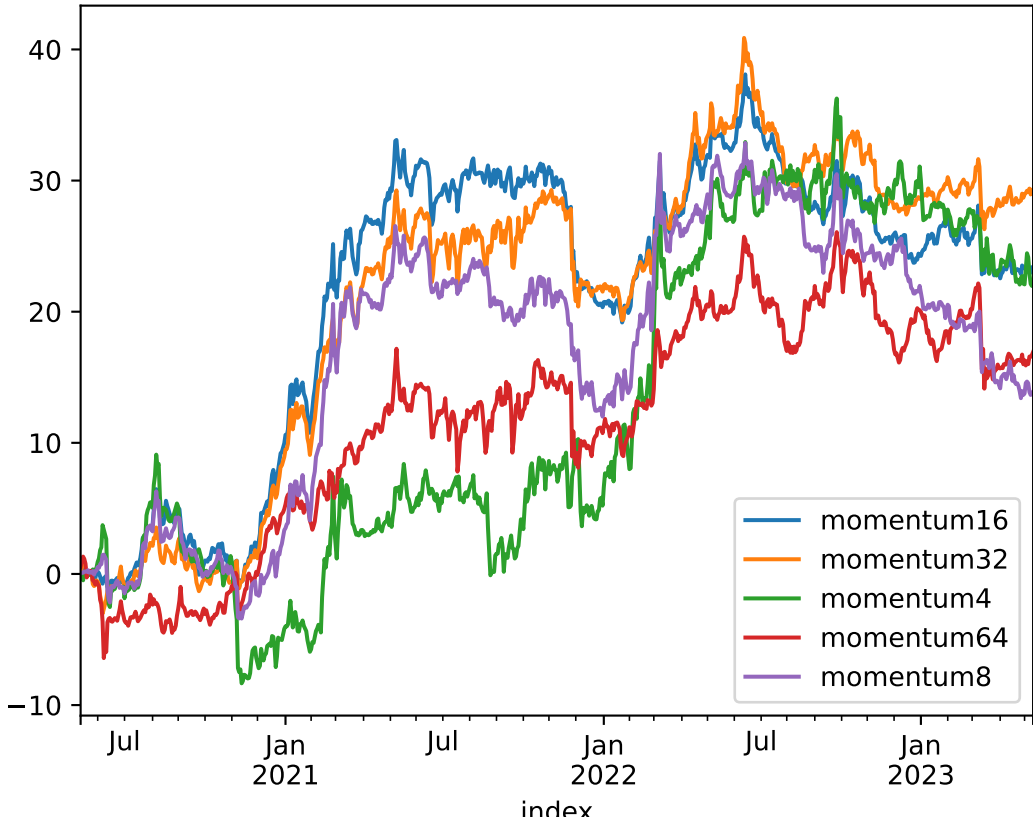
ann. std {'momentum16': 8.489, 'momentum32': 8.812, 'momentum4': 13.225, 'momentum64': 10.15, 'momentum8': 9.741}

ann. SR {'momentum16': -1.15, 'momentum32': -0.5, 'momentum4': -0.55, 'momentum64': -0.27, 'momentum8': -1.76}



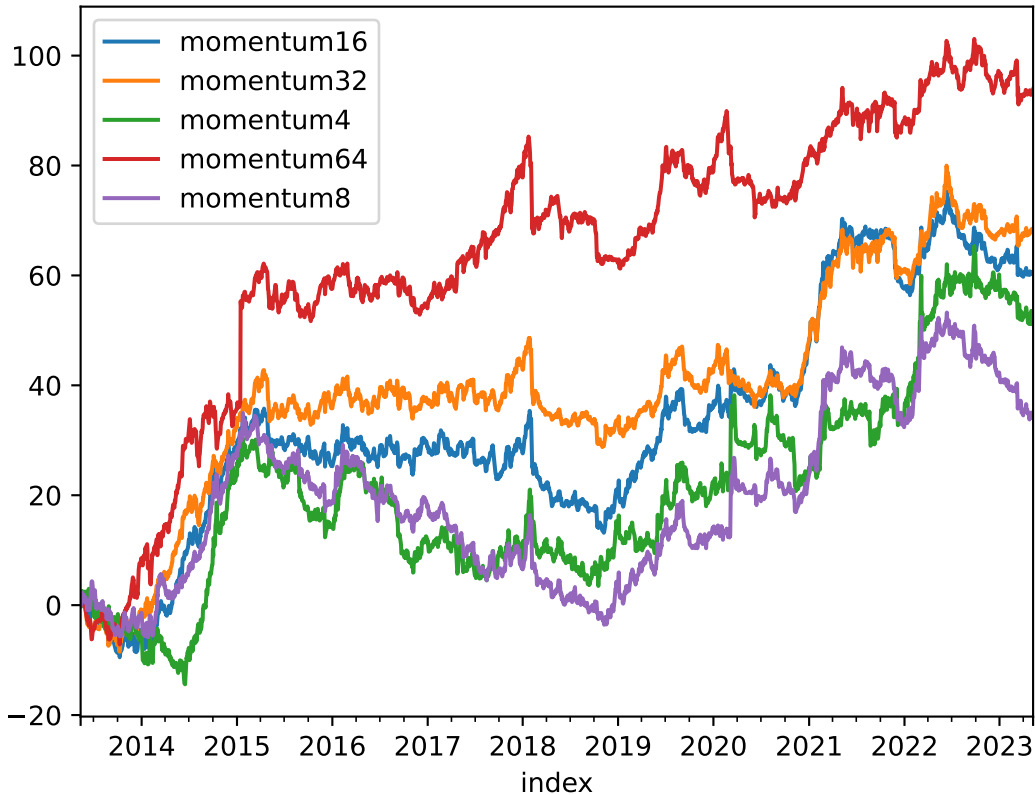
Total Trading Rule P&L for period '3Y'

ann. mean {'momentum16': 7.669, 'momentum32': 9.599, 'momentum4': 7.215, 'momentum64': 5.54, 'momentum8': 4.548}
ann. std {'momentum16': 10.121, 'momentum32': 10.379, 'momentum4': 14.684, 'momentum64': 10.831, 'momentum8': 11.431}
ann. SR {'momentum16': 0.76, 'momentum32': 0.92, 'momentum4': 0.49, 'momentum64': 0.51, 'momentum8': 0.4}



Total Trading Rule P&L for period '10Y'

ann. mean {'momentum16': 5.953, 'momentum32': 6.716, 'momentum4': 5.019, 'momentum64': 9.216, 'momentum8': 3.364}
ann. std {'momentum16': 9.637, 'momentum32': 9.263, 'momentum4': 13.683, 'momentum64': 11.872, 'momentum8': 10.842}
ann. SR {'momentum16': 0.62, 'momentum32': 0.73, 'momentum4': 0.37, 'momentum64': 0.78, 'momentum8': 0.31}

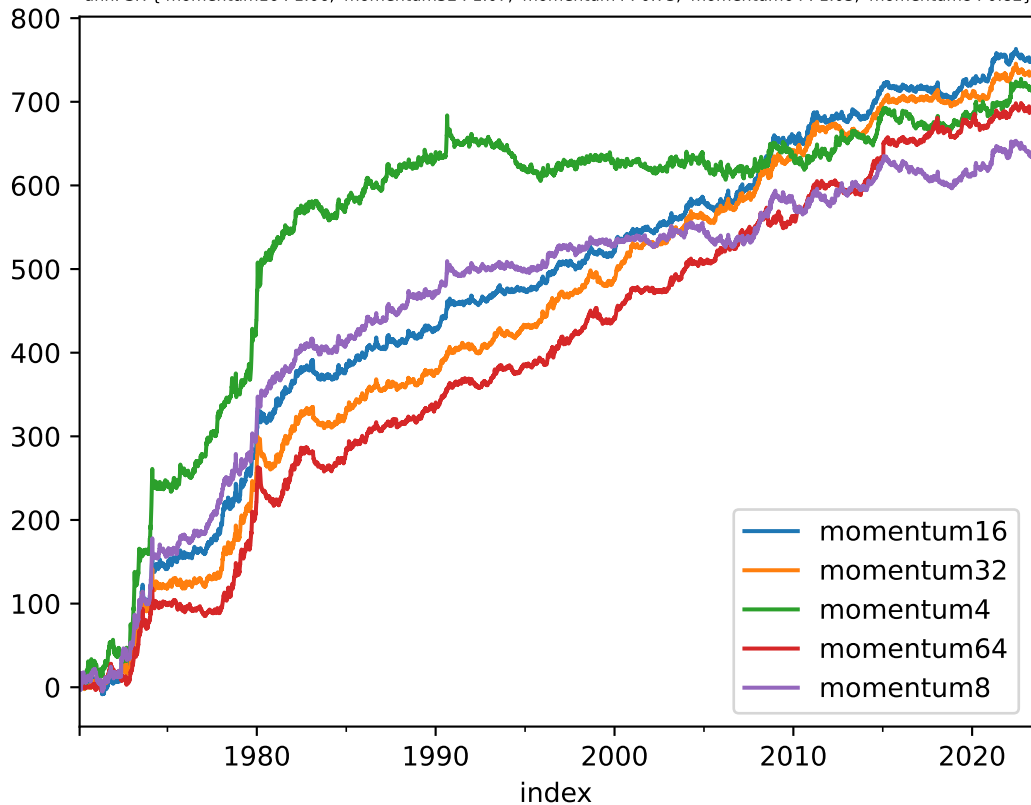


Total Trading Rule P&L for period '99Y'

ann. mean {'momentum16': 13.789, 'momentum32': 13.523, 'momentum4': 13.139, 'momentum64': 12.701, 'momentum8': 11.687}

ann. std {'momentum16': 13.042, 'momentum32': 12.605, 'momentum4': 17.888, 'momentum64': 12.327, 'momentum8': 14.326}

ann. SR {'momentum16': 1.06, 'momentum32': 1.07, 'momentum4': 0.73, 'momentum64': 1.03, 'momentum8': 0.82}

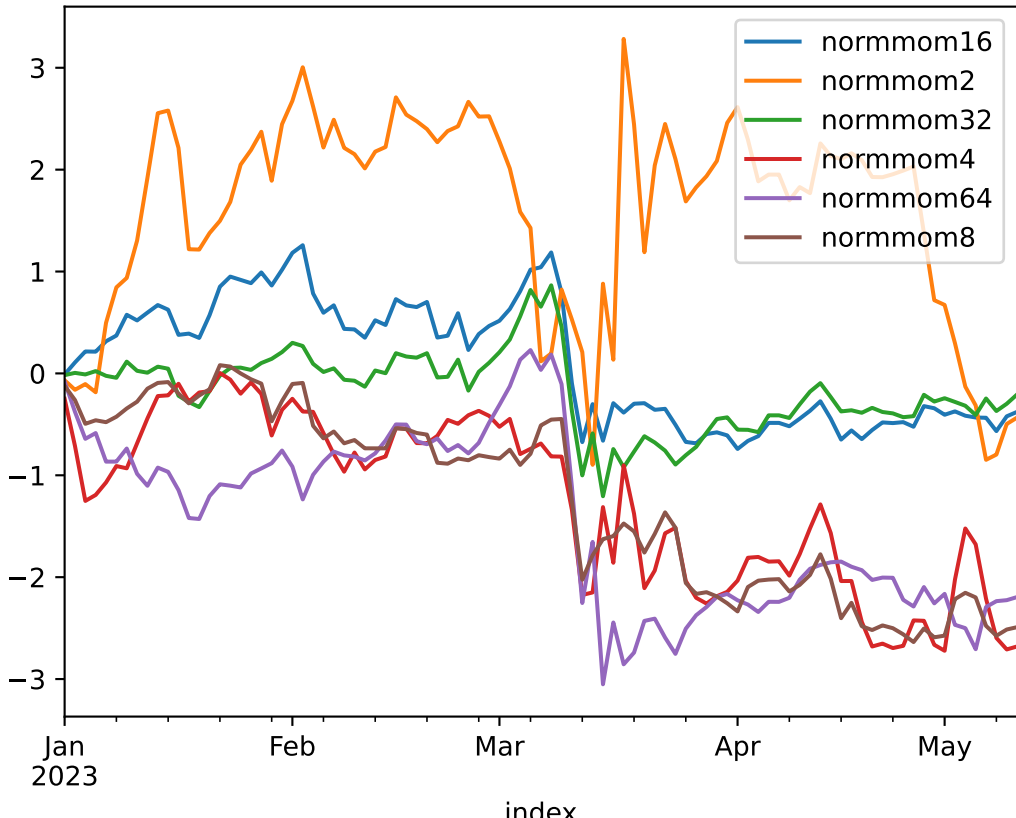


Total Trading Rule P&L for period 'YTD'

ann. mean {'normmom16': -1.039, 'normmom2': -1.194, 'normmom32': -0.569, 'normmom4': -7.378, 'normmom64': -6.043, 'normmom8': -6.856}

ann. std {'normmom16': 3.021, 'normmom2': 8.818, 'normmom32': 2.969, 'normmom4': 4.661, 'normmom64': 4.455, 'normmom8': 3.038}

ann. SR {'normmom16': -0.34, 'normmom2': -0.14, 'normmom32': -0.19, 'normmom4': -1.58, 'normmom64': -1.36, 'normmom8': -2.26}

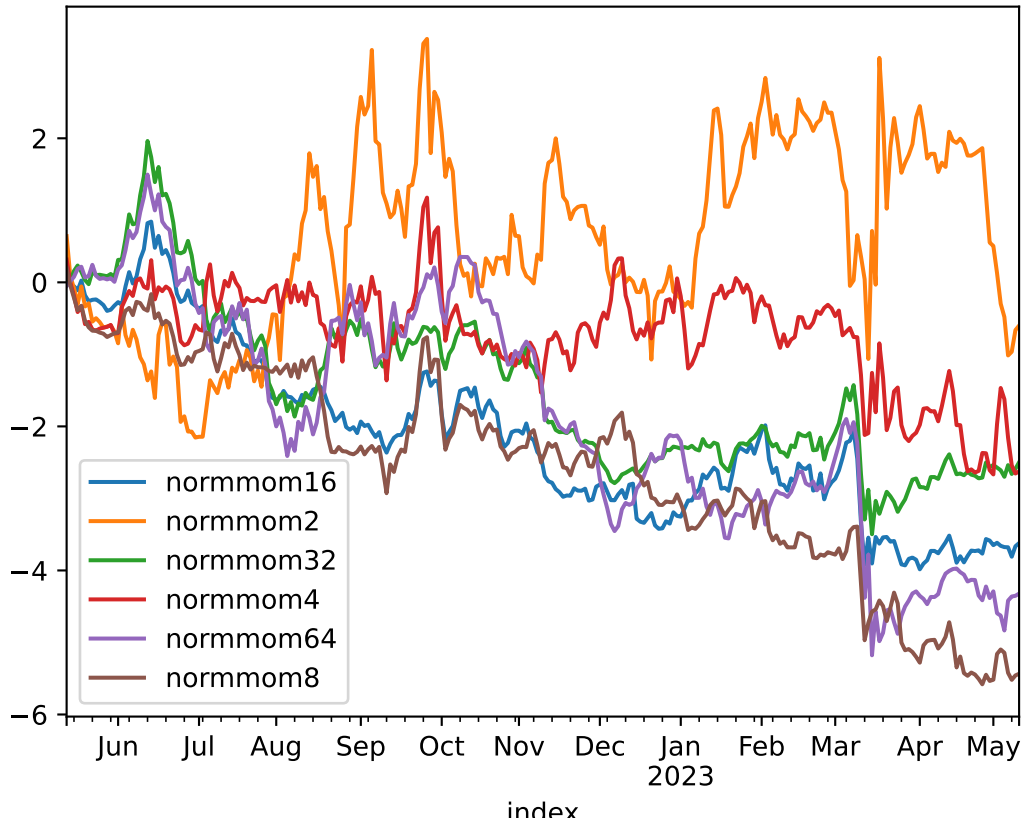


Total Trading Rule P&L for period '1Y'

ann. mean {'normmom16': -3.565, 'normmom2': -0.591, 'normmom32': -2.46, 'normmom4': -2.584, 'normmom64': -4.255, 'normmom8': -5.351}

ann. std {'normmom16': 2.531, 'normmom2': 7.479, 'normmom32': 2.824, 'normmom4': 4.352, 'normmom64': 3.816, 'normmom8': 2.898}

ann. SR {'normmom16': -1.41, 'normmom2': -0.08, 'normmom32': -0.87, 'normmom4': -0.59, 'normmom64': -1.12, 'normmom8': -1.85}

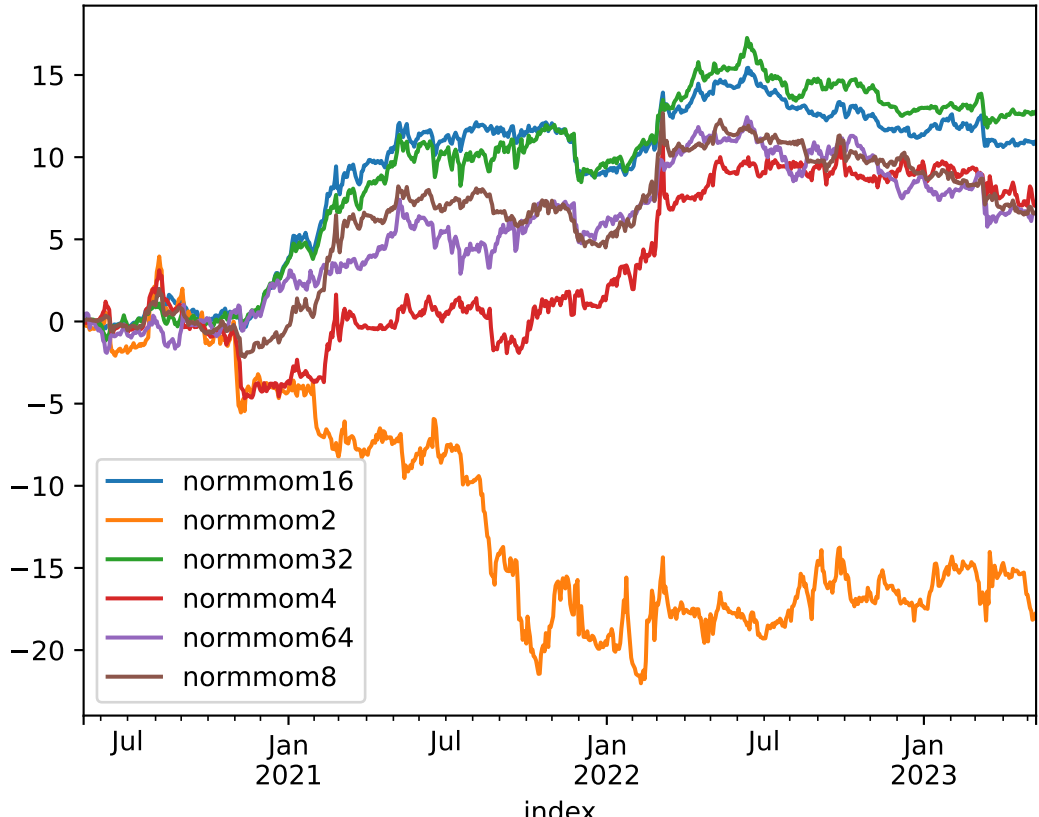


Total Trading Rule P&L for period '3Y'

ann. mean {'normmom16': 3.594, 'normmom2': -5.808, 'normmom32': 4.189, 'normmom4': 2.313, 'normmom64': 2.168, 'normmom8': 2.177}

ann. std {'normmom16': 3.506, 'normmom2': 8.638, 'normmom32': 3.878, 'normmom4': 5.408, 'normmom64': 4.281, 'normmom8': 3.936}

ann. SR {'normmom16': 1.02, 'normmom2': -0.67, 'normmom32': 1.08, 'normmom4': 0.43, 'normmom64': 0.51, 'normmom8': 0.55}

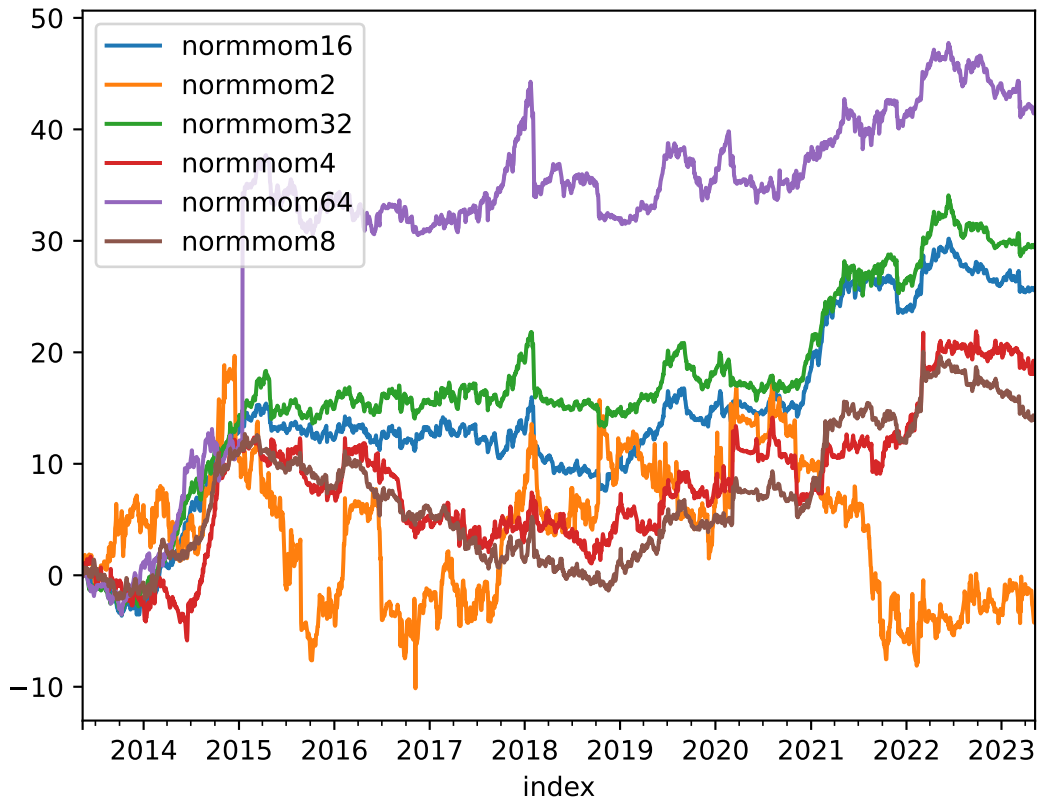


Total Trading Rule P&L for period '10Y'

ann. mean {'normmom16': 2.526, 'normmom2': -0.376, 'normmom32': 2.908, 'normmom4': 1.776, 'normmom64': 4.117, 'normmom8': 1.375}

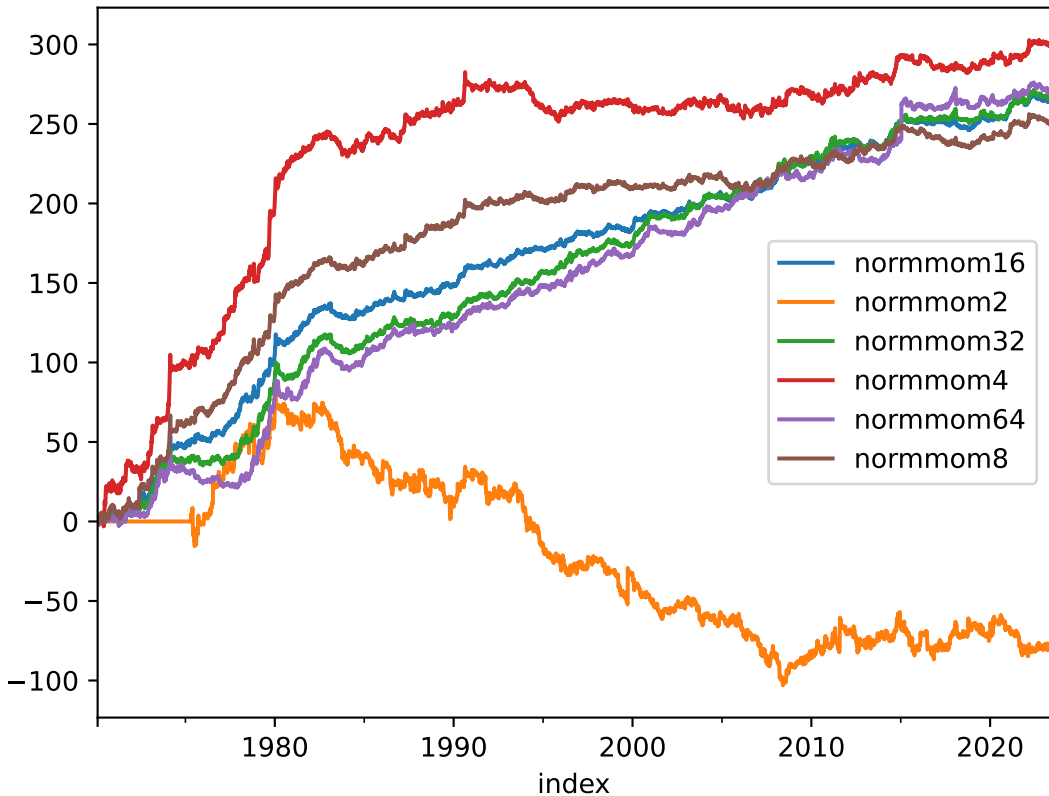
ann. std {'normmom16': 3.458, 'normmom2': 10.314, 'normmom32': 3.618, 'normmom4': 5.451, 'normmom64': 8.273, 'normmom8': 3.876}

ann. SR {'normmom16': 0.73, 'normmom2': -0.04, 'normmom32': 0.8, 'normmom4': 0.33, 'normmom64': 0.5, 'normmom8': 0.35}



Total Trading Rule P&L for period '99Y'

ann. mean {'normmom16': 4.868, 'normmom2': -1.482, 'normmom32': 4.921, 'normmom4': 5.509, 'normmom64': 4.98, 'normmom8': 4.608}
ann. std {'normmom16': 4.531, 'normmom2': 11.607, 'normmom32': 4.608, 'normmom4': 7.383, 'normmom64': 5.868, 'normmom8': 5.363}
ann. SR {'normmom16': 1.07, 'normmom2': -0.13, 'normmom32': 1.07, 'normmom4': 0.75, 'normmom64': 0.85, 'normmom8': 0.86}

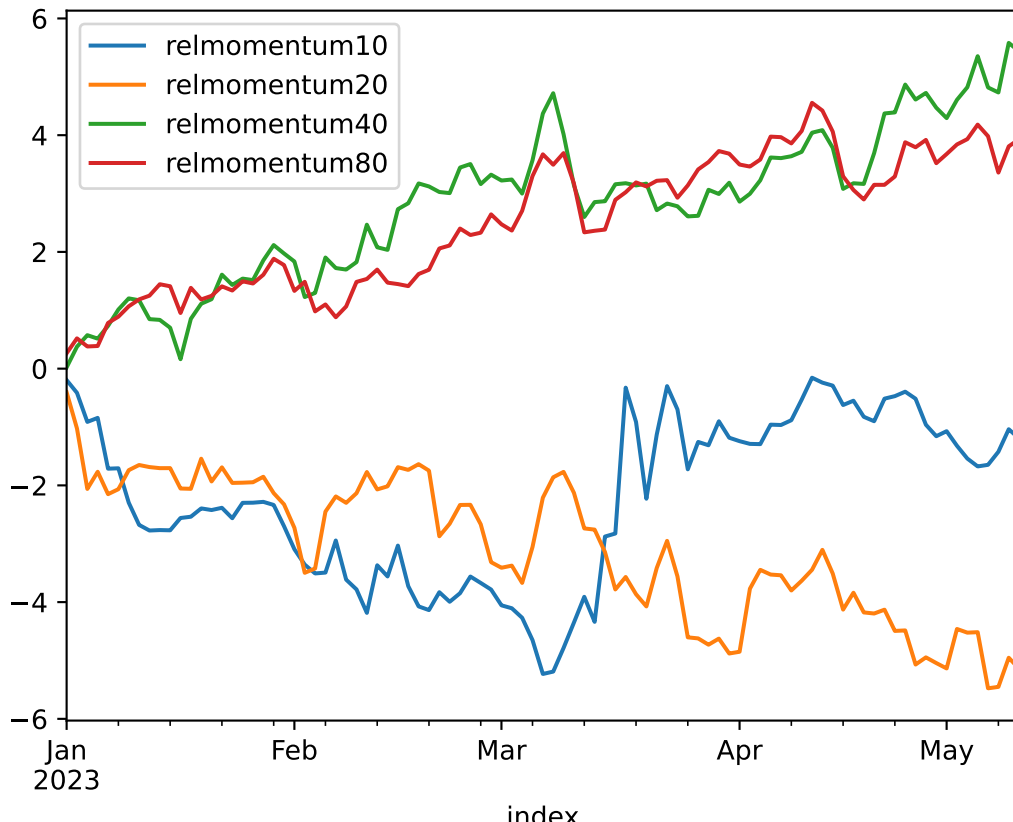


Total Trading Rule P&L for period 'YTD'

ann. mean {'relmomentum10': -3.294, 'relmomentum20': -14.153, 'relmomentum40': 14.967, 'relmomentum80': 10.819}

ann. std {'relmomentum10': 7.76, 'relmomentum20': 6.634, 'relmomentum40': 5.469, 'relmomentum80': 4.421}

ann. SR {'relmomentum10': -0.42, 'relmomentum20': -2.13, 'relmomentum40': 2.74, 'relmomentum80': 2.45}

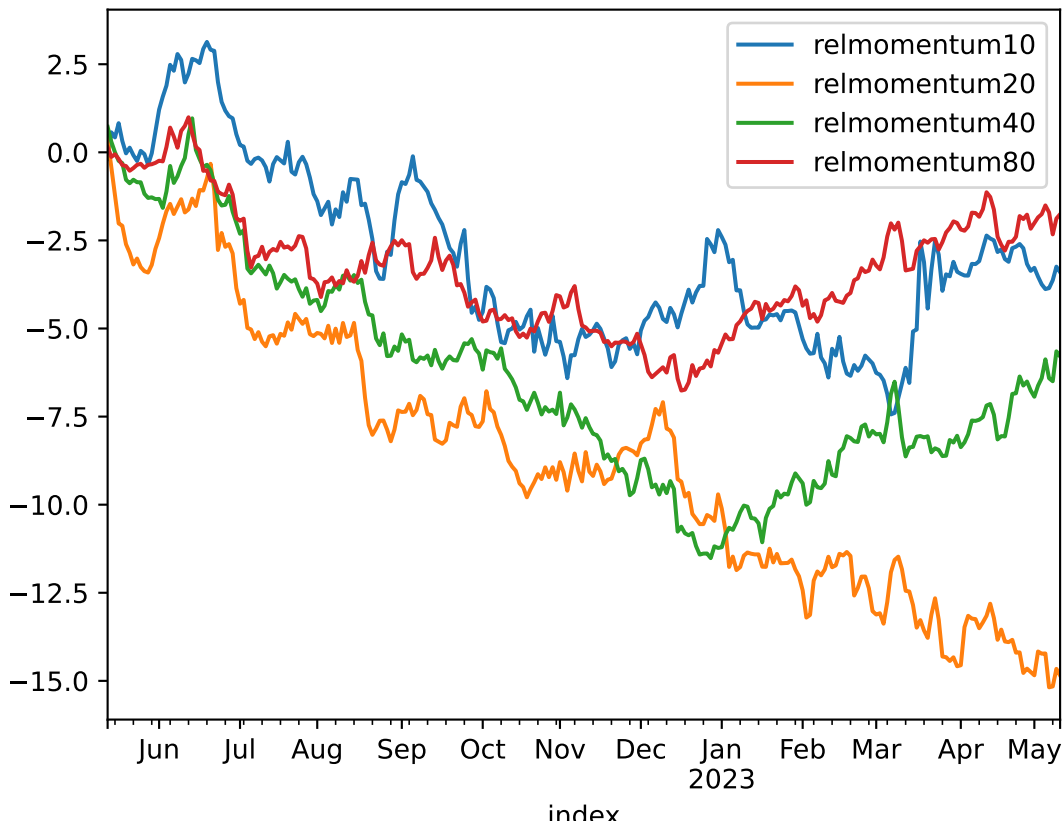


Total Trading Rule P&L for period '1Y'

ann. mean {'relmomentum10': -3.351, 'relmomentum20': -14.619, 'relmomentum40': -5.702, 'relmomentum80': -1.73}

ann. std {'relmomentum10': 7.179, 'relmomentum20': 6.443, 'relmomentum40': 5.331, 'relmomentum80': 4.522}

ann. SR {'relmomentum10': -0.47, 'relmomentum20': -2.27, 'relmomentum40': -1.07, 'relmomentum80': -0.38}

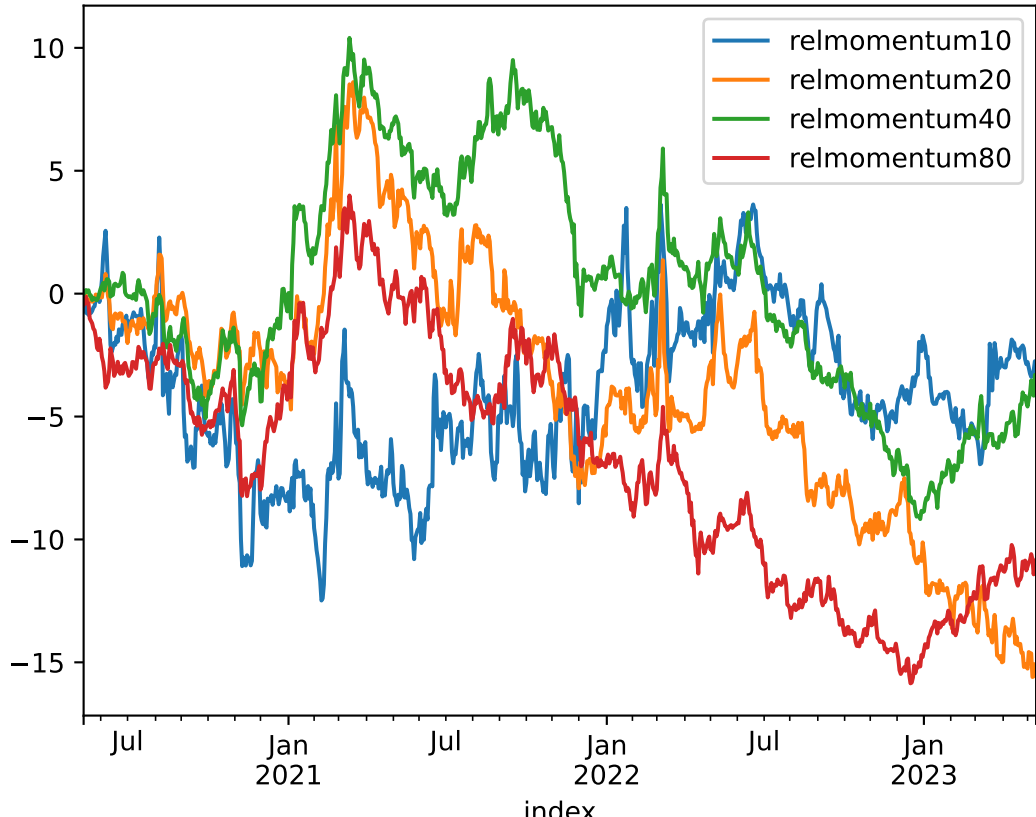


Total Trading Rule P&L for period '3Y'

ann. mean {'relmomentum10': -0.952, 'relmomentum20': -4.996, 'relmomentum40': -1.128, 'relmomentum80': -3.551}

ann. std {'relmomentum10': 11.908, 'relmomentum20': 8.361, 'relmomentum40': 6.965, 'relmomentum80': 6.323}

ann. SR {'relmomentum10': -0.08, 'relmomentum20': -0.6, 'relmomentum40': -0.16, 'relmomentum80': -0.56}

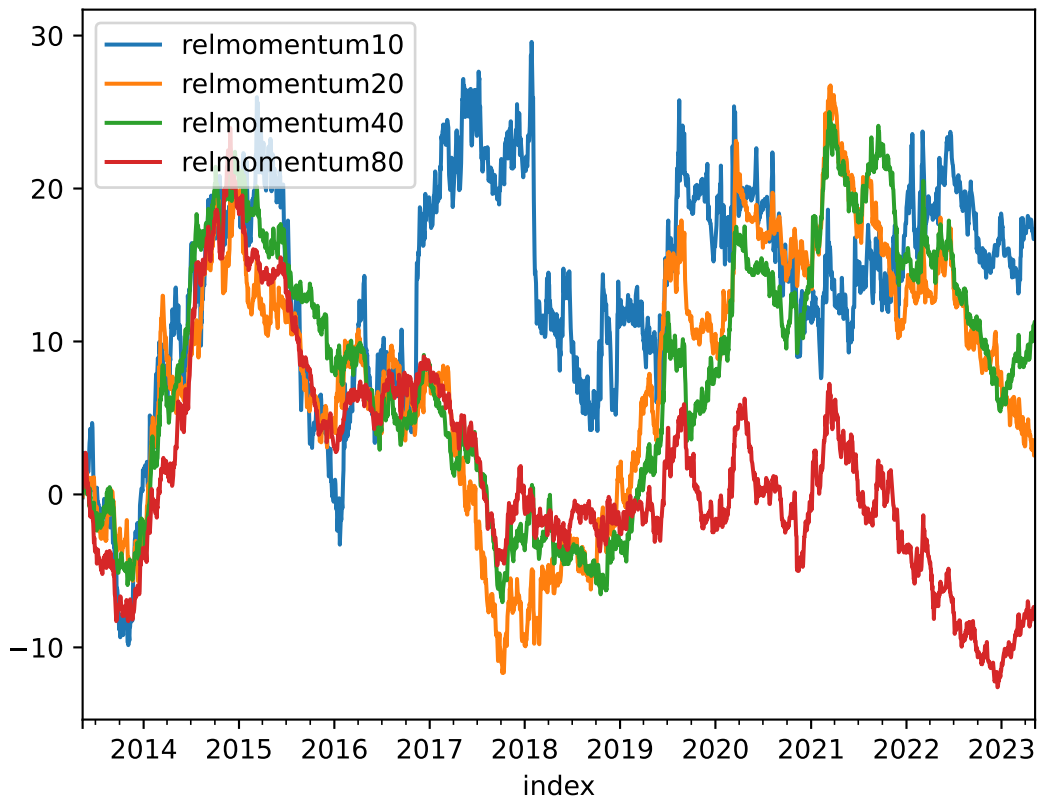


Total Trading Rule P&L for period '10Y'

ann. mean {'relmomentum10': 1.686, 'relmomentum20': 0.282, 'relmomentum40': 1.095, 'relmomentum80': -0.747}

ann. std {'relmomentum10': 13.389, 'relmomentum20': 8.541, 'relmomentum40': 6.994, 'relmomentum80': 6.361}

ann. SR {'relmomentum10': 0.13, 'relmomentum20': 0.03, 'relmomentum40': 0.16, 'relmomentum80': -0.12}

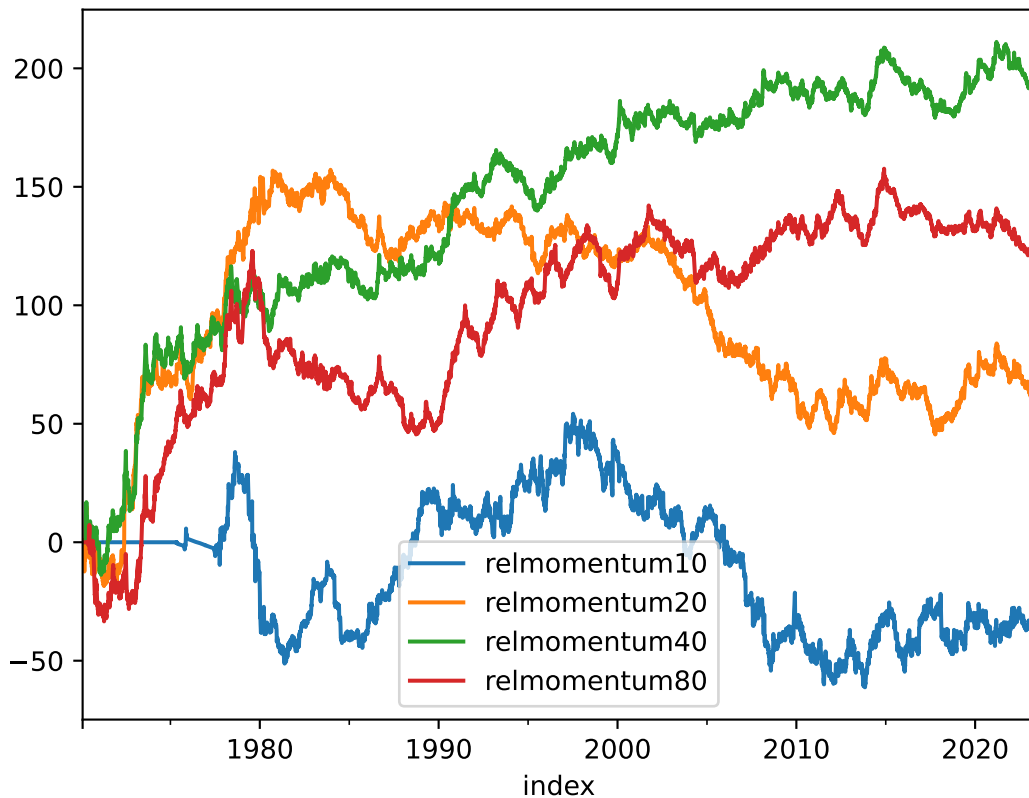


Total Trading Rule P&L for period '99Y'

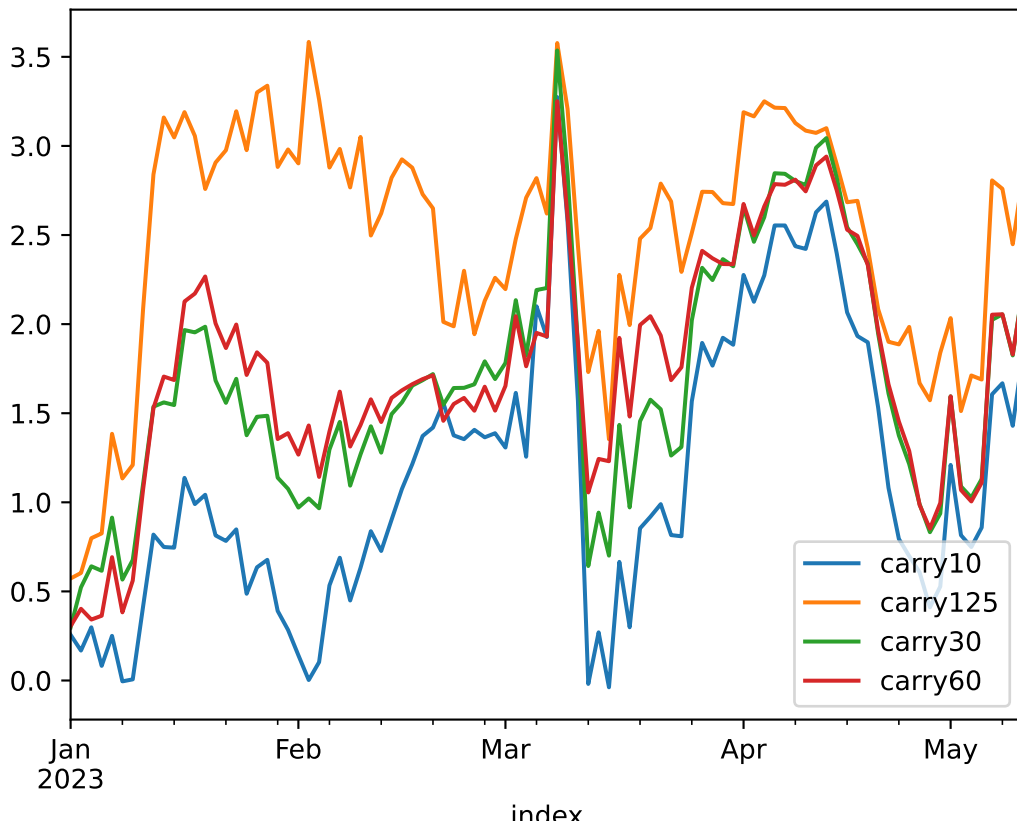
ann. mean {'relmomentum10': -0.63, 'relmomentum20': 1.106, 'relmomentum40': 3.635, 'relmomentum80': 2.323}

ann. std {'relmomentum10': 13.385, 'relmomentum20': 10.466, 'relmomentum40': 9.636, 'relmomentum80': 9.781}

ann. SR {'relmomentum10': -0.05, 'relmomentum20': 0.11, 'relmomentum40': 0.38, 'relmomentum80': 0.24}



Total Trading Rule P&L for period 'YTD'
ann. mean {'carry10': 5.071, 'carry125': 7.825, 'carry30': 6.092, 'carry60': 6.048}
ann. std {'carry10': 5.953, 'carry125': 5.662, 'carry30': 5.582, 'carry60': 5.101}
ann. SR {'carry10': 0.85, 'carry125': 1.38, 'carry30': 1.09, 'carry60': 1.19}

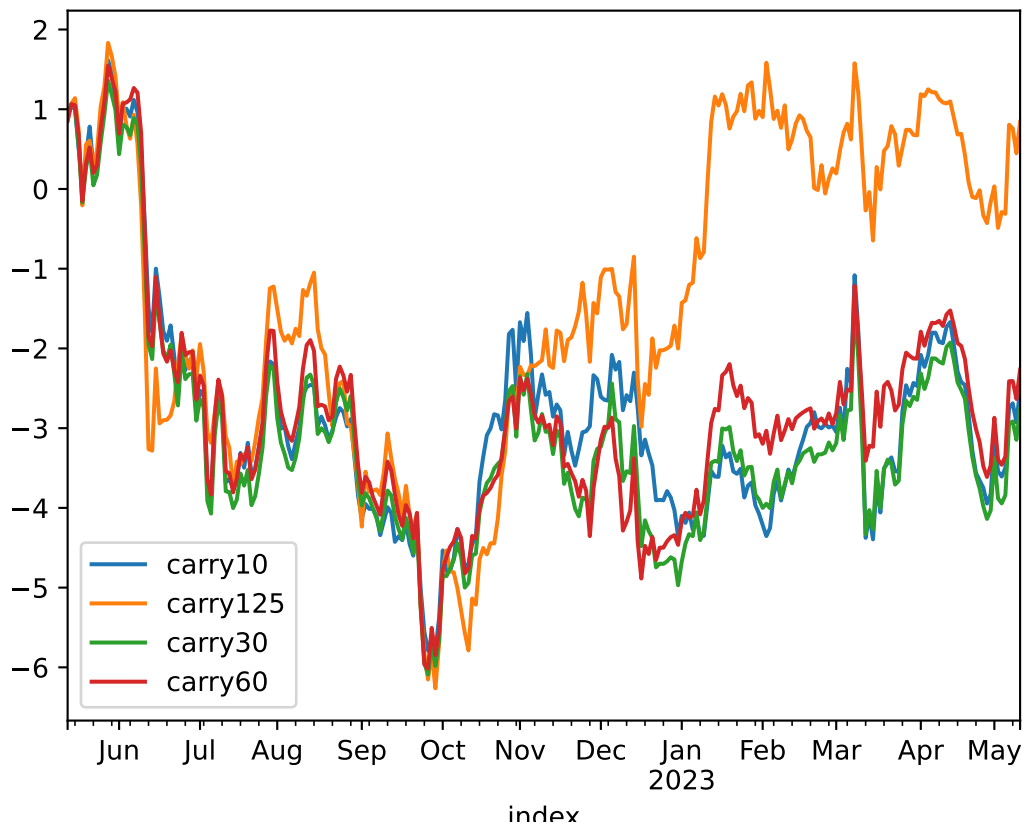


Total Trading Rule P&L for period '1Y'

ann. mean {'carry10': -2.476, 'carry125': 0.829, 'carry30': -2.715, 'carry60': -2.232}

ann. std {'carry10': 5.999, 'carry125': 6.515, 'carry30': 5.992, 'carry60': 5.929}

ann. SR {'carry10': -0.41, 'carry125': 0.13, 'carry30': -0.45, 'carry60': -0.38}

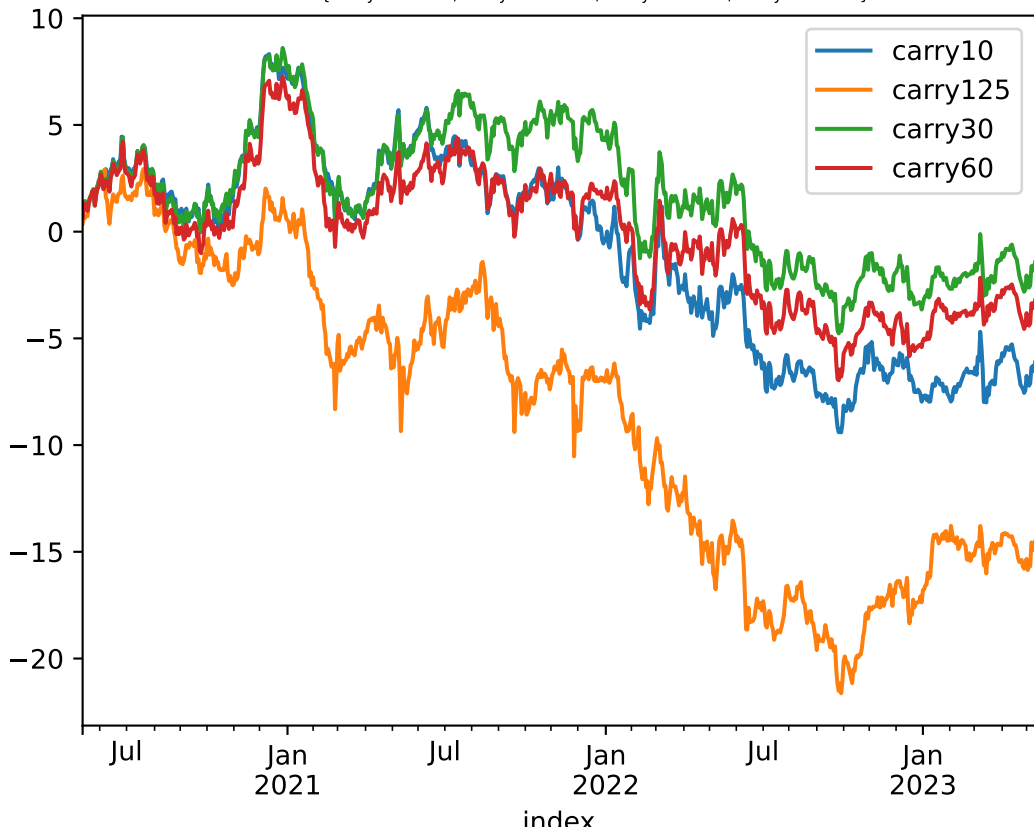


Total Trading Rule P&L for period '3Y'

ann. mean {'carry10': -2.005, 'carry125': -4.755, 'carry30': -0.47, 'carry60': -1.052}

ann. std {'carry10': 6.554, 'carry125': 8.016, 'carry30': 6.494, 'carry60': 6.486}

ann. SR {'carry10': -0.31, 'carry125': -0.59, 'carry30': -0.07, 'carry60': -0.16}

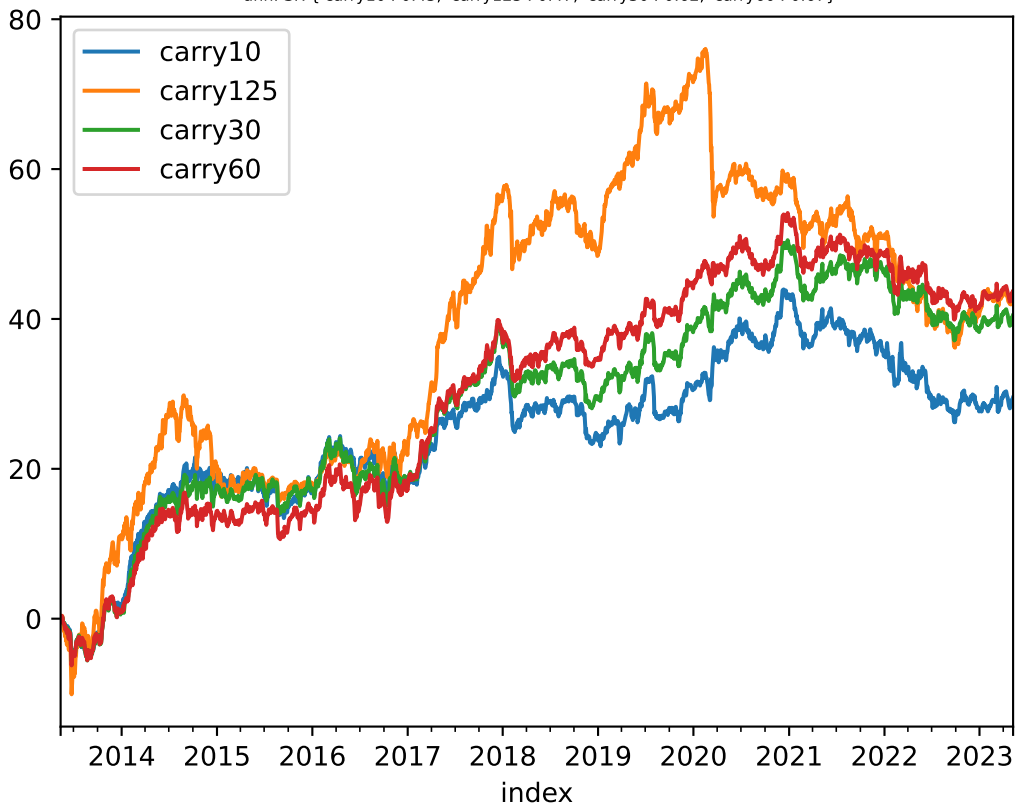


Total Trading Rule P&L for period '10Y'

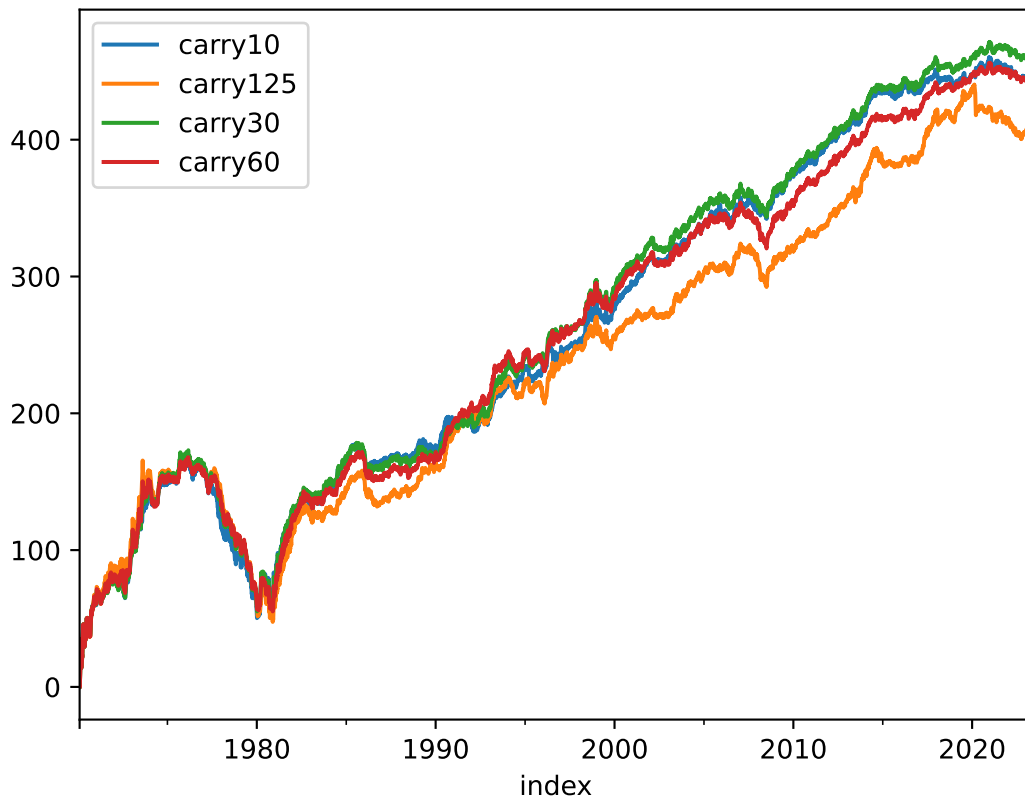
ann. mean {'carry10': 2.895, 'carry125': 4.247, 'carry30': 3.972, 'carry60': 4.286}

ann. std {'carry10': 6.368, 'carry125': 8.949, 'carry30': 6.455, 'carry60': 6.4}

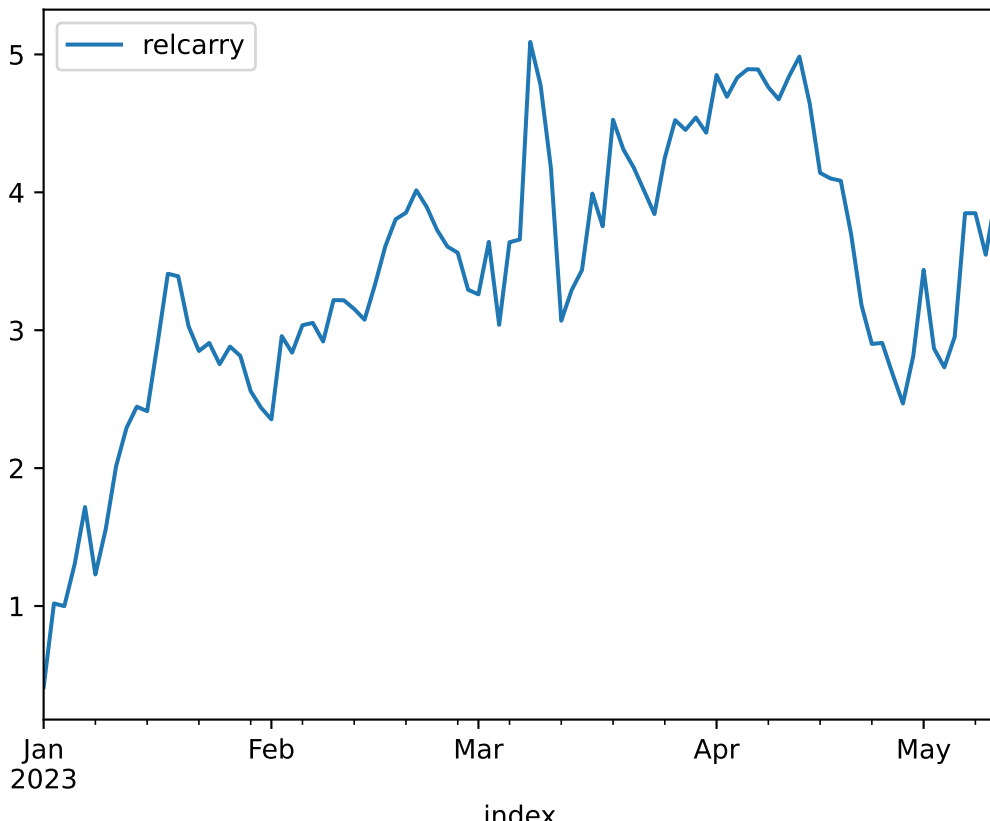
ann. SR {'carry10': 0.45, 'carry125': 0.47, 'carry30': 0.62, 'carry60': 0.67}



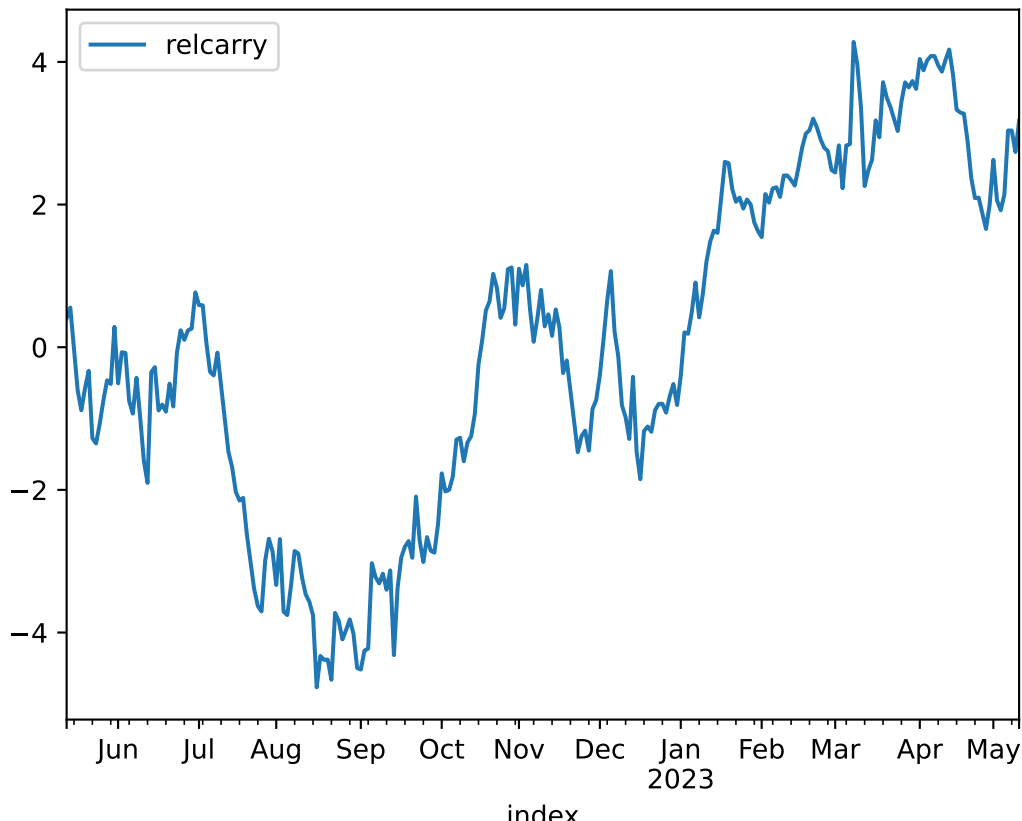
Total Trading Rule P&L for period '99Y'
ann. mean {'carry10': 8.213, 'carry125': 7.507, 'carry30': 8.5, 'carry60': 8.212}
ann. std {'carry10': 11.198, 'carry125': 11.555, 'carry30': 11.255, 'carry60': 11.258}
ann. SR {'carry10': 0.73, 'carry125': 0.65, 'carry30': 0.76, 'carry60': 0.73}



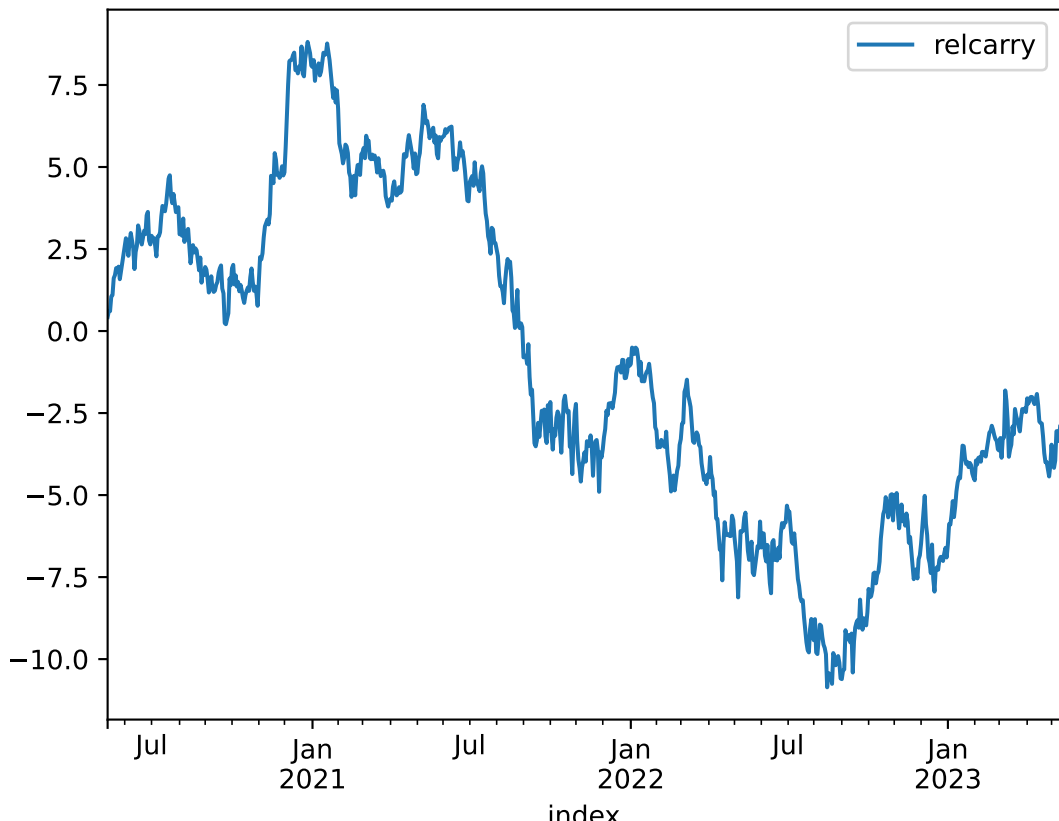
Total Trading Rule P&L for period 'YTD'
ann. mean {'relcarry': 10.968}
ann. std {'relcarry': 5.834}
ann. SR {'relcarry': 1.88}



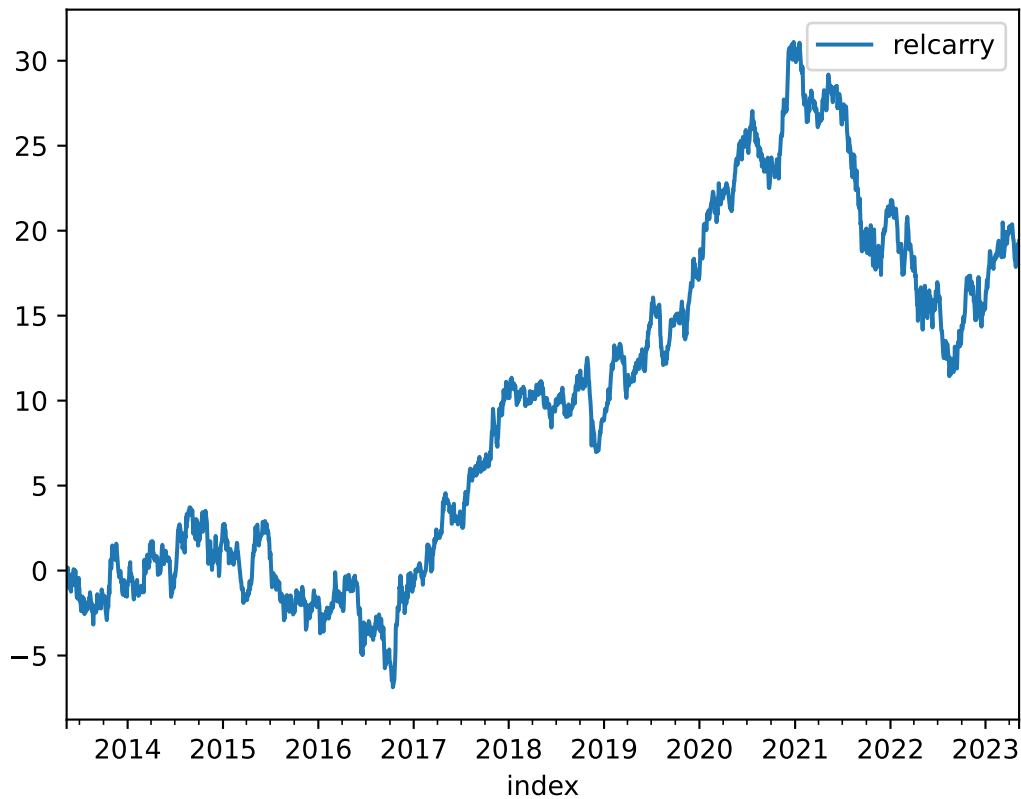
Total Trading Rule P&L for period '1Y'
ann. mean {'relcarry': 3.125}
ann. std {'relcarry': 6.81}
ann. SR {'relcarry': 0.46}



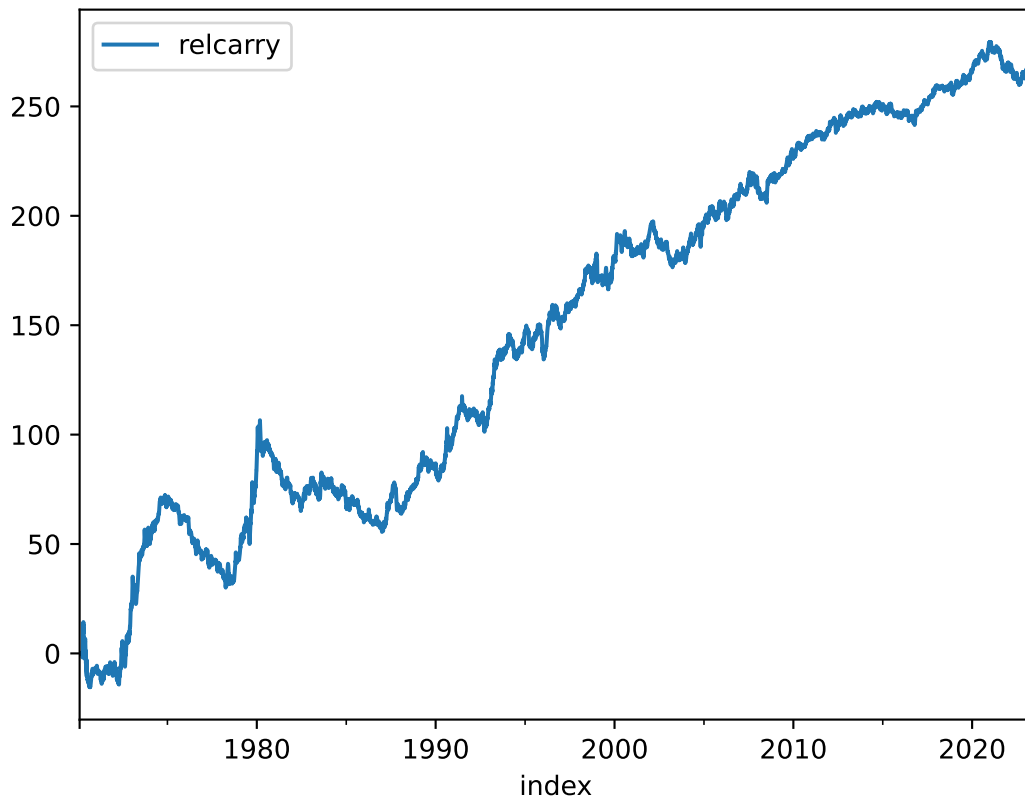
Total Trading Rule P&L for period '3Y'
ann. mean {'relcarry': -0.955}
ann. std {'relcarry': 6.686}
ann. SR {'relcarry': -0.14}



Total Trading Rule P&L for period '10Y'
ann. mean {'relcarry': 1.902}
ann. std {'relcarry': 5.824}
ann. SR {'relcarry': 0.33}

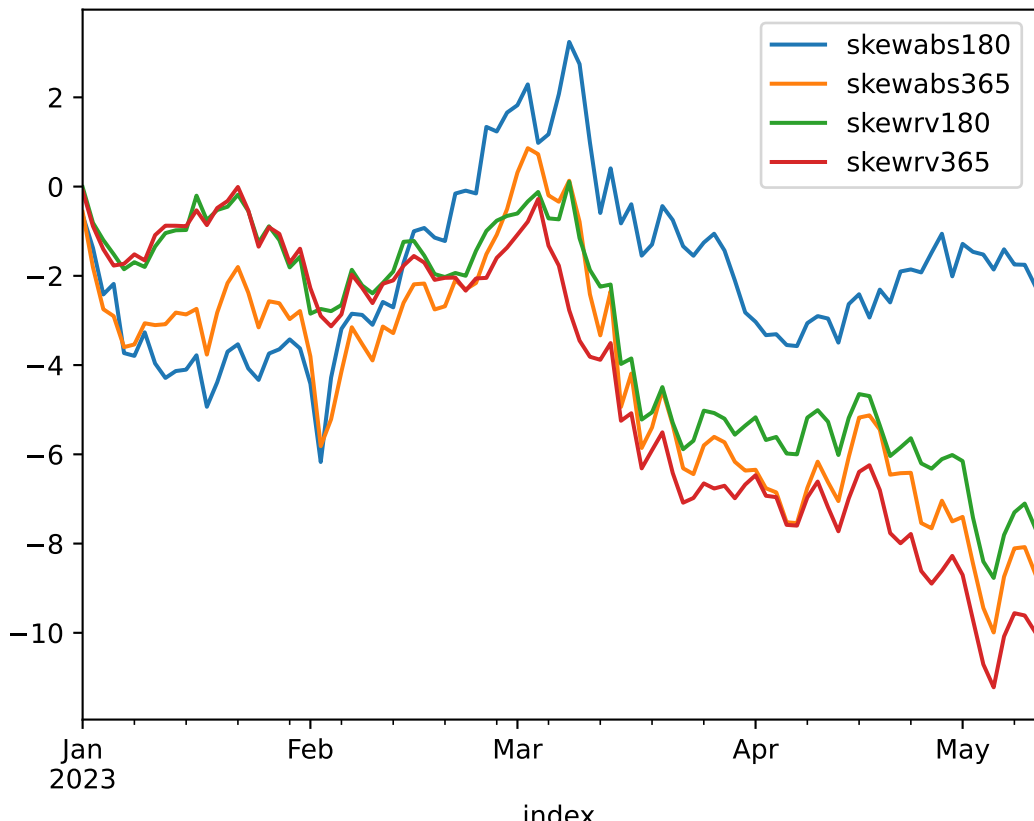


Total Trading Rule P&L for period '99Y'
ann. mean {'relcarry': 4.932}
ann. std {'relcarry': 8.959}
ann. SR {'relcarry': 0.55}



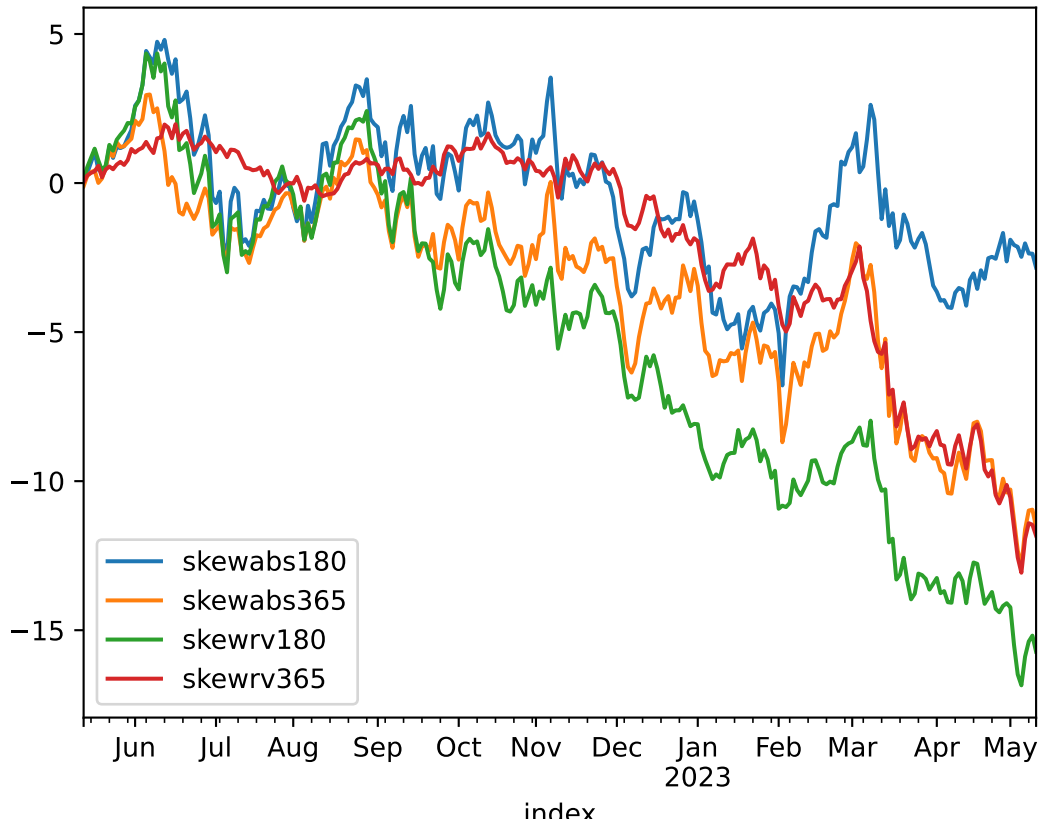
Total Trading Rule P&L for period 'YTD'

ann. mean {'skewabs180': -6.108, 'skewabs365': -23.853, 'skewrv180': -21.037, 'skewrv365': -27.473}
ann. std {'skewabs180': 11.1, 'skewabs365': 11.744, 'skewrv180': 8.467, 'skewrv365': 8.329}
ann. SR {'skewabs180': -0.55, 'skewabs365': -2.03, 'skewrv180': -2.48, 'skewrv365': -3.3}



Total Trading Rule P&L for period '1Y'

ann. mean {'skewabs180': -2.793, 'skewabs365': -11.366, 'skewrv180': -15.479, 'skewrv365': -11.649}
ann. std {'skewabs180': 11.029, 'skewabs365': 9.993, 'skewrv180': 9.419, 'skewrv365': 6.065}
ann. SR {'skewabs180': -0.25, 'skewabs365': -1.14, 'skewrv180': -1.64, 'skewrv365': -1.92}

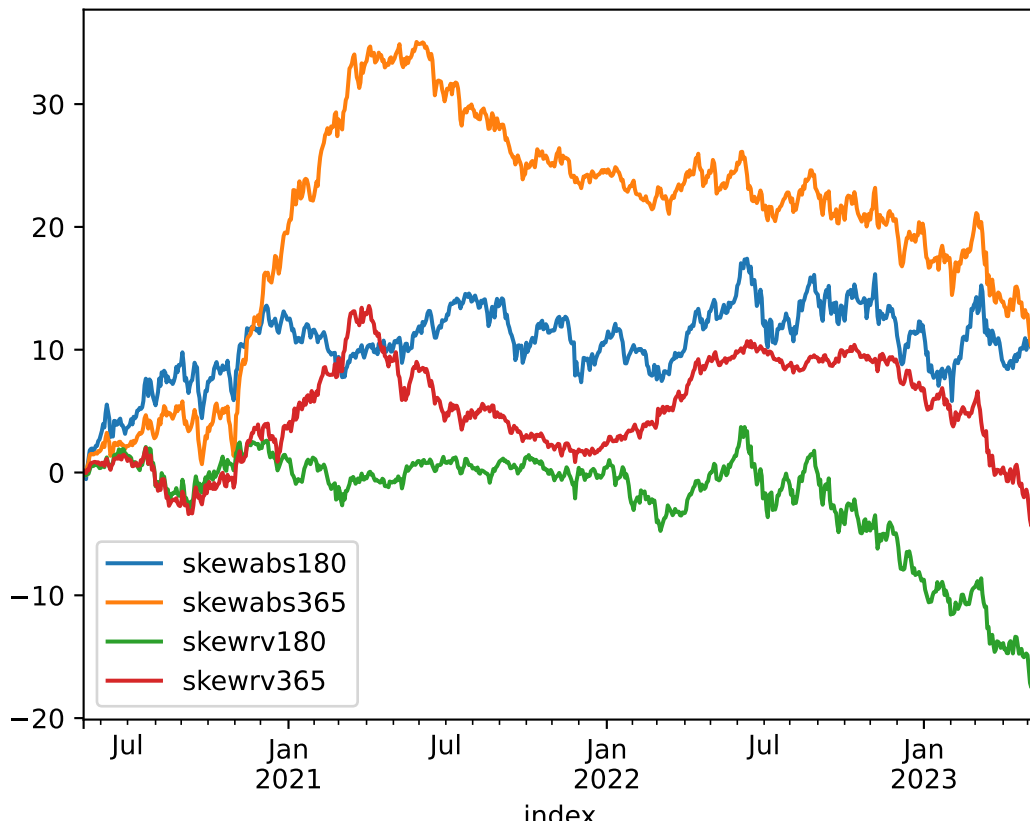


Total Trading Rule P&L for period '3Y'

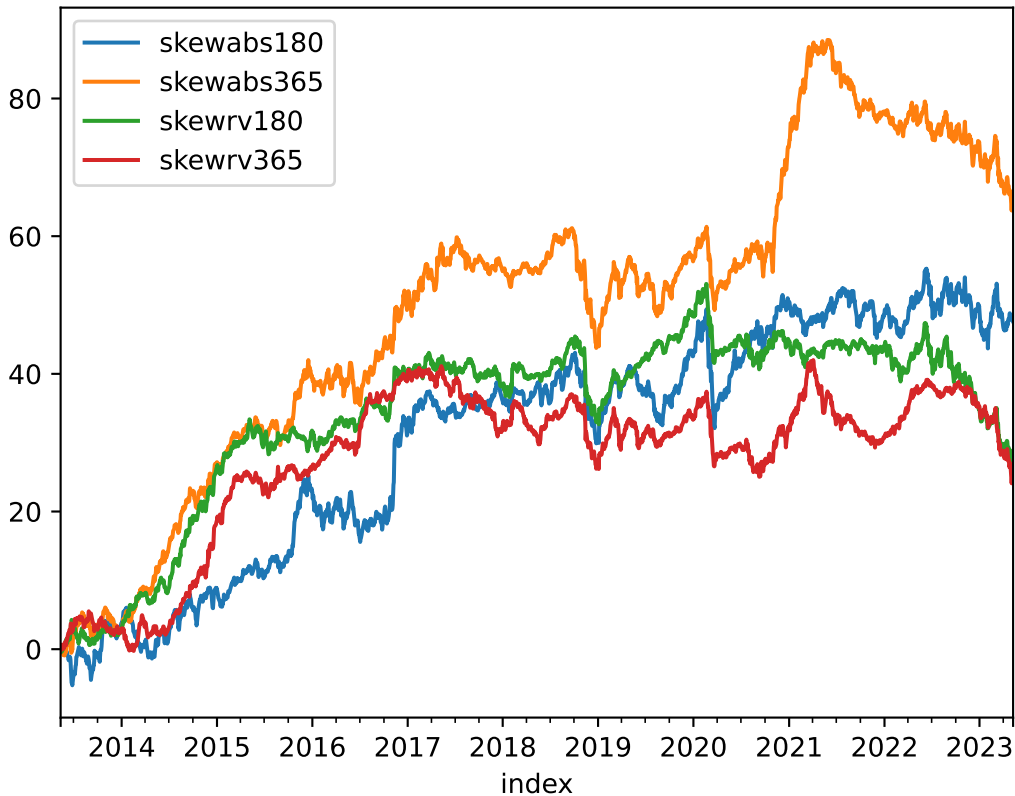
ann. mean {'skewabs180': 3.201, 'skewabs365': 3.799, 'skewrv180': -5.357, 'skewrv365': -1.014}

ann. std {'skewabs180': 9.136, 'skewabs365': 8.995, 'skewrv180': 7.33, 'skewrv365': 6.448}

ann. SR {'skewabs180': 0.35, 'skewabs365': 0.42, 'skewrv180': -0.73, 'skewrv365': -0.16}



Total Trading Rule P&L for period '10Y'
ann. mean {'skewabs180': 4.677, 'skewabs365': 6.385, 'skewrv180': 2.678, 'skewrv365': 2.487}
ann. std {'skewabs180': 8.018, 'skewabs365': 7.972, 'skewrv180': 6.417, 'skewrv365': 6.079}
ann. SR {'skewabs180': 0.58, 'skewabs365': 0.8, 'skewrv180': 0.42, 'skewrv365': 0.41}

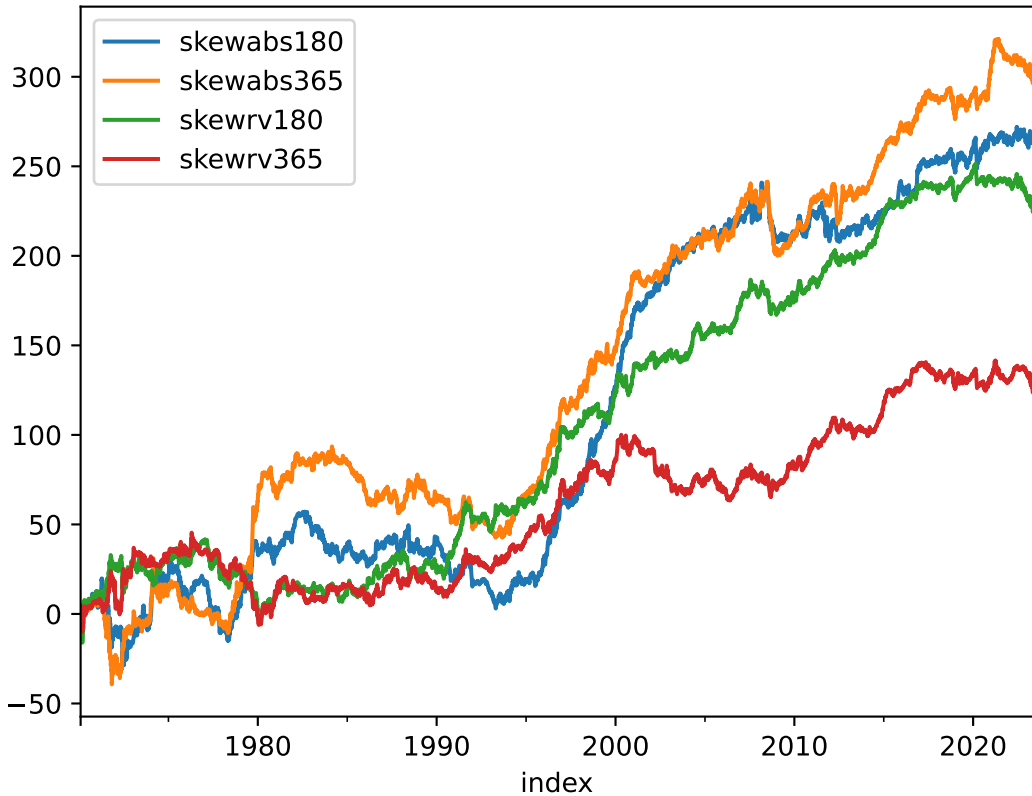


Total Trading Rule P&L for period '99Y'

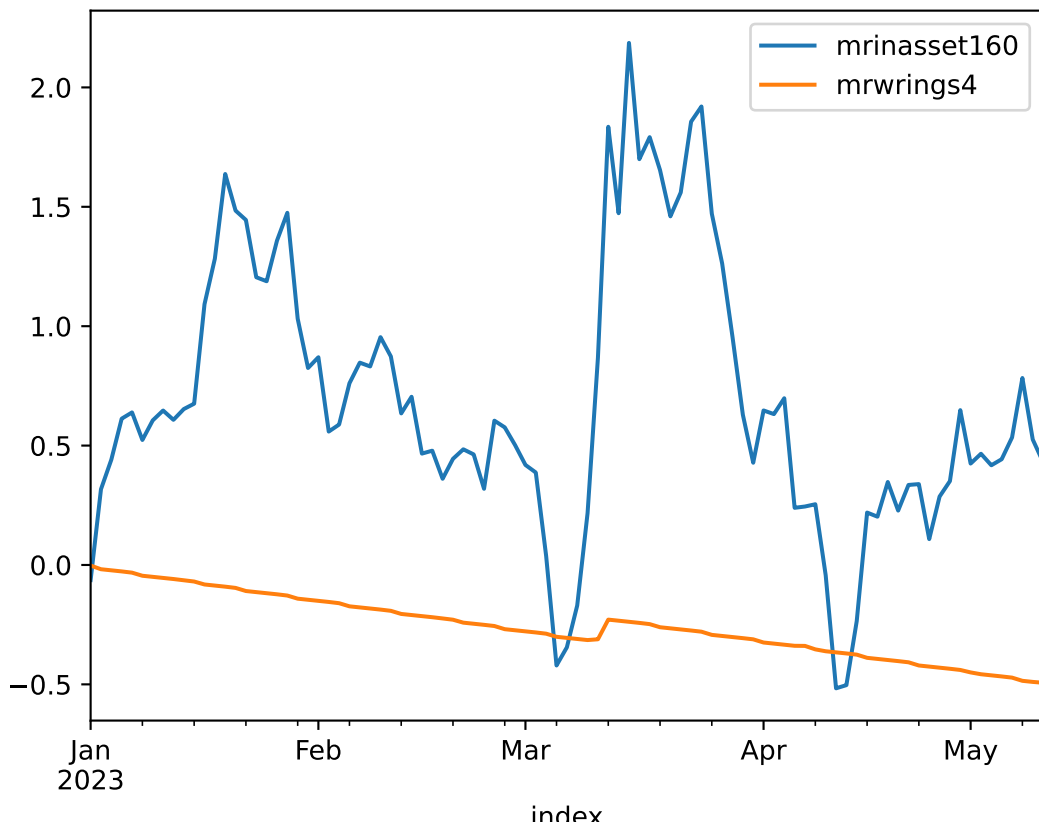
ann. mean {'skewabs180': 4.869, 'skewabs365': 5.484, 'skewrv180': 4.156, 'skewrv365': 2.3}

ann. std {'skewabs180': 10.099, 'skewabs365': 9.871, 'skewrv180': 8.753, 'skewrv365': 8.127}

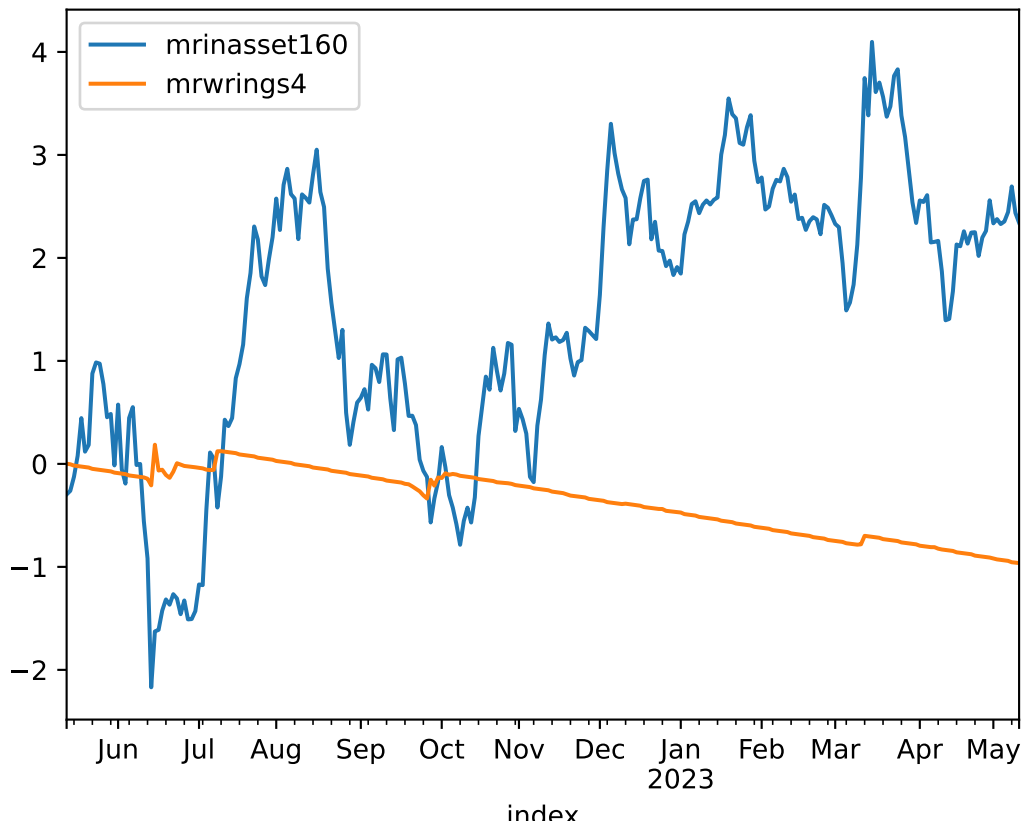
ann. SR {'skewabs180': 0.48, 'skewabs365': 0.56, 'skewrv180': 0.47, 'skewrv365': 0.28}



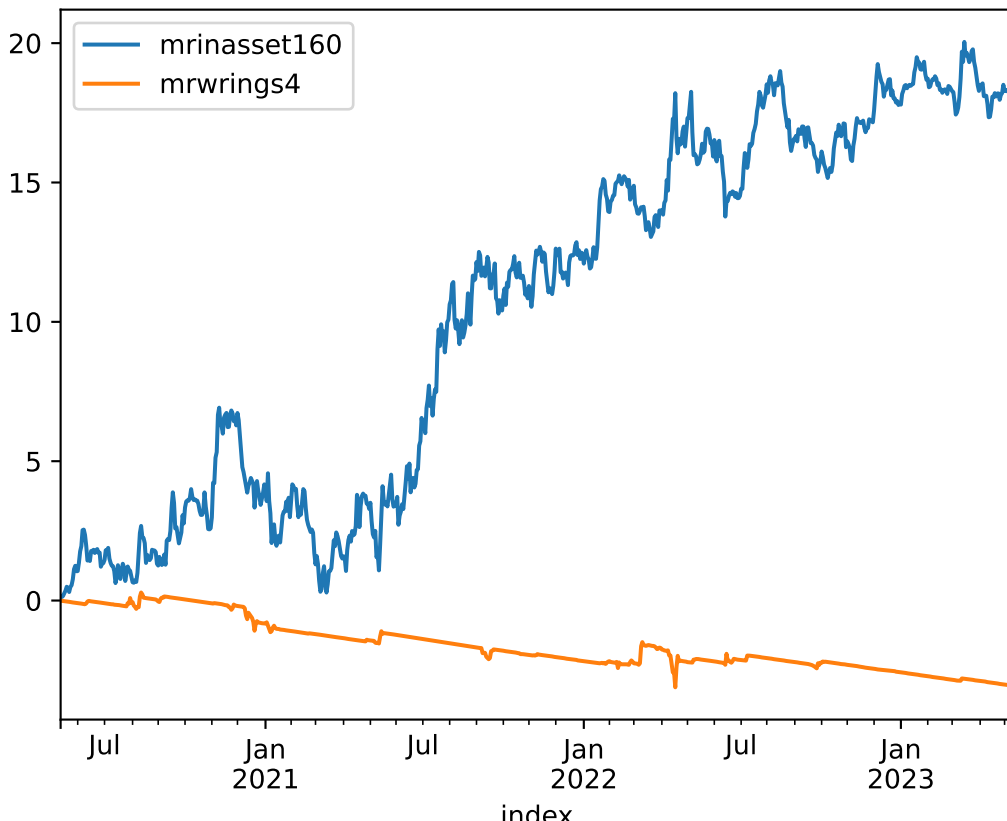
Total Trading Rule P&L for period 'YTD'
ann. mean {'mriasset160': 1.185, 'mrwrings4': -1.358}
ann. std {'mriasset160': 4.094, 'mrwrings4': 0.158}
ann. SR {'mriasset160': 0.29, 'mrwrings4': -8.6}



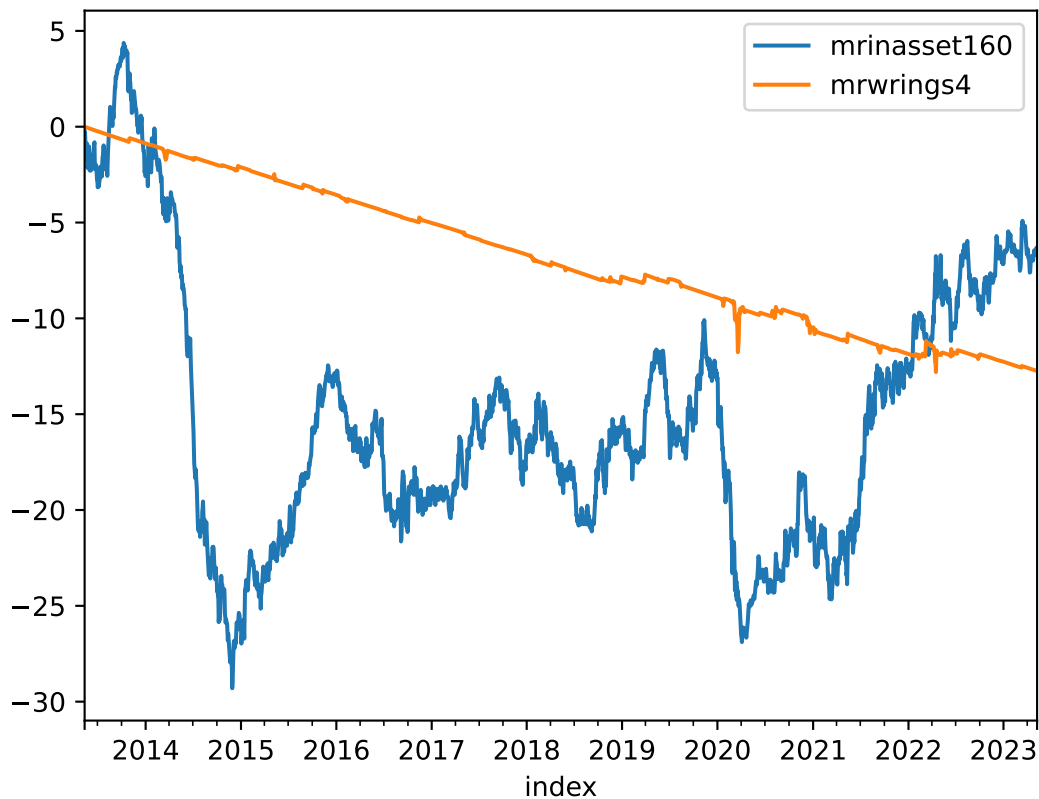
Total Trading Rule P&L for period '1Y'
ann. mean {'mrinasset160': 2.305, 'mrwrings4': -0.948}
ann. std {'mrinasset160': 4.804, 'mrwrings4': 0.574}
ann. SR {'mrinasset160': 0.48, 'mrwrings4': -1.65}



Total Trading Rule P&L for period '3Y'
ann. mean {'mrinasset160': 5.987, 'mrwrings4': -1.002}
ann. std {'mrinasset160': 6.258, 'mrwrings4': 1.017}
ann. SR {'mrinasset160': 0.96, 'mrwrings4': -0.99}



Total Trading Rule P&L for period '10Y'
ann. mean {'mrinasset160': -0.654, 'mrwrings4': -1.251}
ann. std {'mrinasset160': 6.193, 'mrwrings4': 0.879}
ann. SR {'mrinasset160': -0.11, 'mrwrings4': -1.42}



Total Trading Rule P&L for period '99Y'
ann. mean {'mrinasset160': -3.56, 'mrwrings4': -2.165}
ann. std {'mrinasset160': 9.864, 'mrwrings4': 2.087}
ann. SR {'mrinasset160': -0.36, 'mrwrings4': -1.04}

