Example Cancers

Cancer 1

Decreasing pressure tolerance

Simulation setup:

"PressureAtCell":100,

"PressureNearCell":1,

3 blast cells in center of single tissue with the following parameters:

"startingPressureToleranceAtLocation":100,

"startingPressureToleranceAtNeighbors":1,

"startingDivideRate":0.35,

"startingDeathRate":0.01,

"FoodConsumptionRate":1,

"FoodMaxStorage":100,

"FoodConcernLevel":70,

"MoveProbability":0.3,

"EnterPipeProbability":0.3,

"LeavePipeProbability":0.1,

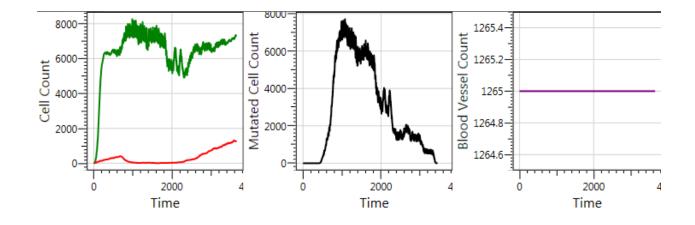
"SurvivePipeProbability":0.9,

"CallPipeProbability":0.0

Mutation:

Division prob: 0.75

Pressure tolerance at neighbors: 204



Cancer 2 Allowing angiogenesis

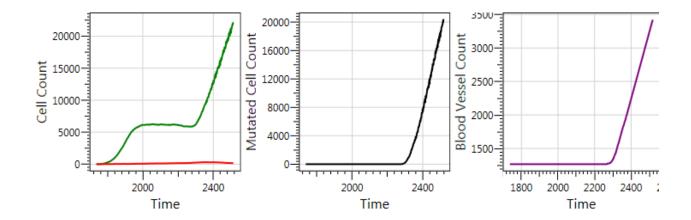
Setup same as above Cancer 1

Mutation:

Division probability: 0.75

Pressure tolerance at neighbors: 204

CallPipeProbability: 0.80



Cancer 3

Decreasing food consumption

Simulation setup:

"PressureAtCell":100,

"PressureNearCell":1,

3 blast cells in center of single tissue with the following parameters:

"startingPressureToleranceAtLocation":100,

"startingPressureToleranceAtNeighbors":1,

"startingDivideRate":0.35,

"startingDeathRate":0.01,

"FoodConsumptionRate":3,

"FoodMaxStorage":300,

"FoodConcernLevel":70,

"MoveProbability":0.3,

"EnterPipeProbability":0.3,

"LeavePipeProbability":0.1,

"SurvivePipeProbability":0.9,

"CallPipeProbability":0.0

Mutation:

division probability: 0.8

pressure tolerance at neighbors: 155 pressure tolerance at location: 205

food consumption rate: 1

