crystallite_stressAndItsTangent (Crystallite Loop) NiterationCrystallite = NiterationCrystallite + 1 any: .not.crystallite_converged.and..not.crystallite_localConstitution .true. .false. all: crystallite converged = crystallite converged and crystallite localConstitution Ø crystallite_converged .true. .false. WINDING FORWARD: CUTBACK: crystallite_subFrac = crystallite_subFrac + crystallite_subStep crystallite_subStep=0.5*crystallite_subStep crystallite_subStep = min(1.0 -_crystallite_subFrac, 2.0 * crystallite_subStep) crystallite_Fp=crystallite_subFp0 crystallite_Lp = crystallite_subLp0 constitutive_state = crystallite_subState0 crystallite_subStep>subStepMin .true. .false. crystallite subF0 = crystallite subF crystallite subFp0=crystallite Fp Ø crystallite_subLp0 = crystallite_Lp constitutive_subState0 = crystallite_state crystallite_onTrack = crystallite_subStep>subStepMin crystallite onTrack .true. .false. crystallite_subF = crystallite_subF0 + crystallite_subStep*(crystallite_partionedF - crystallite_partionedF0) Ø crystallite_subdt=crystallite_subStep*crystallite_dt crystallite_converged = .false. NiterationState = 0 STATE LOOP: any: crystallite_requested .and. crystallite_onTrack .and. .not crystallite_converged and. NiterationState < ncryst NiterationState = NiterationState + 1 crystallite_requested.and.crystallite_onTrack.and..not.crystallite_converged .true. .false. Ø crystallite_stateConverged = crystallite_updateState crystallite_requested.and.crystallite_onTrack.and..not.crystallite_converged .false. .true. crystallite_stressConverged=crystallite_integrateStress Ø crystallite_onTrack = crystallite_stressConverged crystallite_converged = crystallite_stateConverged .and. crystallite_stressConverged