

Product	Package		Capacities
midas NFX	Standard		<ul style="list-style-type: none"> • Pre/post processor (fully integrated GUI) - designer, analyst modes - Parasolid interface, 64Bit, Multi-core Calculation
			<ul style="list-style-type: none"> • Linear static analysis (including prestressed linear static)
			<ul style="list-style-type: none"> • Modal analysis (including prestressed modal)
			<ul style="list-style-type: none"> • Buckling analysis
			<ul style="list-style-type: none"> • Linear contact analysis
			<ul style="list-style-type: none"> • Composite materials analysis - 2D, 3D
			<ul style="list-style-type: none"> • Fatigue analysis - S-N, ϵ-N methods
	Standard+	Thermal Stress	<ul style="list-style-type: none"> • Steady state heat transfer / thermal stress analysis - Linear, nonlinear • Transient heat transfer / thermal stress analysis - Linear, nonlinear - Temperature dependent materials, boundary conditions
	Professional	Nonlinear	<ul style="list-style-type: none"> • Nonlinear static analysis - Nonlinear material analysis - elasto plastic, hyper elastic, creep - Nonlinear geometry analysis - large displacement, large rotation - Nonlinear contact analysis - general contact, friction
		Linear Dynamic	<ul style="list-style-type: none"> • Transient response analysis • Response spectrum analysis • Frequency response analysis • Random analysis
Nonlinear Dynamic		<ul style="list-style-type: none"> • Explicit dynamic analysis • Implicit dynamic analysis • Multi-body dynamic analysis 	
Optimization		<ul style="list-style-type: none"> • Topology optimization • Size optimization 	
midas NFX CFD	Standard		<ul style="list-style-type: none"> • Pre/post processor (fully integrated GUI) - designer, analyst modes - Parasolid interface, 64Bit, Multi-core Calculation
			<ul style="list-style-type: none"> • General fluid flow analysis - steady / transient, compressible / incompressible - 13 turbulent models, boundary layer mesh - 1-way fluid structure interaction analysis
	Standard+	Heat Transfer	<ul style="list-style-type: none"> • Conduction, convection, Radiation: surface to surface, discrete ordinate • Joule Heating, PCB thermal resistance model, 1-D pipe • Moving reference frame • Porous media, fan boundary condition
	Professional	Mesh Deformation	<ul style="list-style-type: none"> • Stretchable mesh, discontinuous mesh interpolation • Overset Mesh
		Multi-phase Flow	<ul style="list-style-type: none"> • Free surface analysis • Discrete particle analysis
		Mixture Analysis	
CAD Interface			<ul style="list-style-type: none"> • Parasolid (included in all packages) • CATIA V4/V5, UG, Pro/E, SolidWorks, Solid Edge, Inventor • STEP, IGES, ACIS
GPU Acceleration			<ul style="list-style-type: none"> • GPU Calculation (supported for all types of structural and CFD analysis except for explicit dynamic analysis)