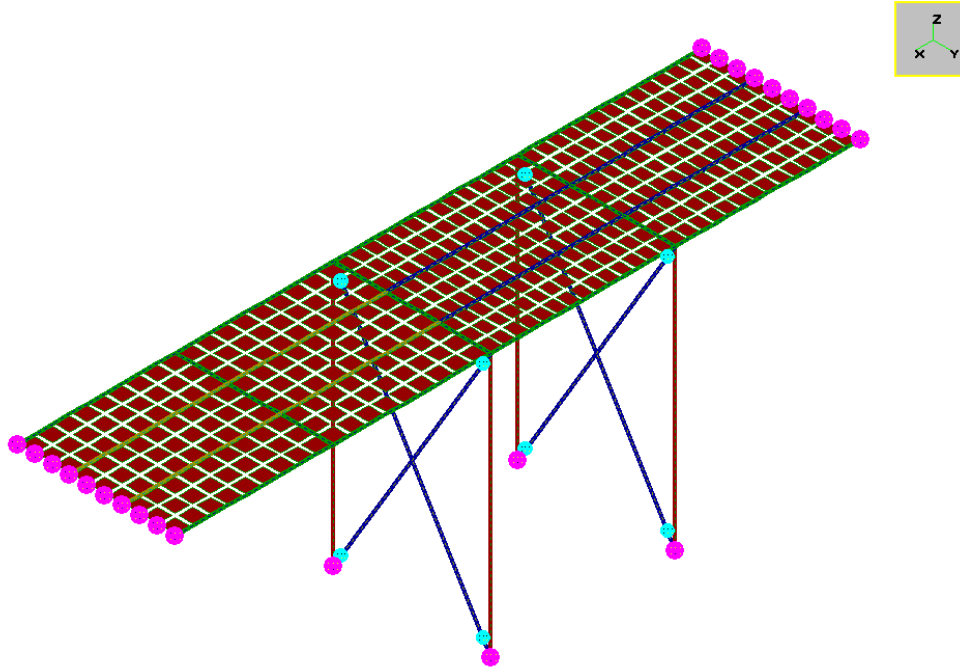


Comparison between Sargon (V8.50), NXNASTRAN and NEiNASTRAN					
TEST 44	VALIDATION, CROSS CHECKS, RELIABILITY, BENCHMARK	Marco Croci	14/04/2008		



	Sargon (Clever)	NXNASTRAN	% errNX	NEiNASTRAN	% errNE
Model Name	tes44.WSR	tes44000.dat		tes44.NAS	
Output file	tes44.CEN	tes44000.f06		tes44.OUT	
Q1	-4.225E-01	-4.222E-01	0.073	-4.213E-01	0.290
Q2	3.621E+02	3.622E+02	-0.023	3.622E+02	-0.039
Q3	2.030E+00	2.011E+00	0.924	1.999E+00	1.553
Q4	3.328E+04	3.329E+04	-0.020	3.329E+04	-0.040
Q5	-6.002E+05	-6.003E+05	-0.024	-6.004E+05	-0.040

Compared Values:

Q1 = Load Set 1 - Node 67 - Dz

Q2 = Load Set 1 - Beam element 194 - Shear y (End1)

Q3 = Load Set 1 - Node 240 on plate shell element 170 - Von Mises stress

Q4 = Load Set 1 - Node 7 - Constraint force Tz

Q5 = Load Set 1 - Node 481 - Constraint moment Mx

Translations: [mm] Forces: [N] Moments [Nmm]

% errNX = (Sargon - NX) / NX * 100; % errNE = (Sargon - NE) / NE * 100

NXNASTRAN and NEiNASTRAN values are rounded up to 4 significant digits; in some cases sign of moment value is changed in order to use the same Sargon rule.

Model data

Degrees of freedom = 2756

Beam elements = 223

Plate shell elements = 414

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