

## Príloha č. 2

Výpočet strát a napätia v predpínacej výstuži

Staničenie [m]	Bez strát		Straty									Prierez				Maximálne napätie		Napätie					
	M <sub>p,max</sub> [MNm]	N <sub>p,max</sub> [MN]	Vnesenie predpätia			Uvedenie do prevádzky			Koniec životnosti			A	e <sub>h</sub>	e <sub>d</sub>	l <sub>y</sub>	HV [MPa]	DV [MPa]	Vnesenie predpätia		Uvedenie do prevádzky		Koniec životnosti	
			Straty	M <sub>p,m,0</sub> [MNm]	N <sub>p,m,0</sub> [MN]	Straty	M <sub>p,m,up</sub> [MNm]	N <sub>p,m,up</sub> [MN]	Straty	M <sub>p,m,kz</sub> [MNm]	N <sub>p,m,kz</sub> [MN]							HV [MPa]	DV [MPa]	HV [MPa]	DV [MPa]	HV [MPa]	DV [MPa]
0	-1,285	-25,188	5%	-1,221	-23,929	15%	-1,092	-21,410	25%	-0,964	-18,891	1,7951	-0,353	0,647	0,09393	-9,203	-22,881	-8,743	-21,737	-7,823	-19,449	-6,903	-17,161
2	-1,537	-25,188	5%	-1,460	-23,929	15%	-1,307	-21,410	25%	-1,153	-18,891	1,8321	-0,426	0,627	0,090822	-6,538	-24,360	-6,211	-23,142	-5,557	-20,706	-4,904	-18,270
4	-1,790	-25,188	5%	-1,700	-23,929	15%	-1,521	-21,410	25%	-1,342	-18,891	1,8956	-0,507	0,637	0,10304	-4,481	-24,353	-4,257	-23,135	-3,809	-20,700	-3,361	-18,264
6	-2,043	-25,188	5%	-1,940	-23,929	15%	-1,736	-21,410	25%	-1,532	-18,891	2,085	-0,734	0,68	0,17457	-3,492	-20,037	-3,318	-19,035	-2,969	-17,032	-2,619	-15,028
6,45	-2,099	-25,188	5%	-1,994	-23,929	15%	-1,784	-21,410	25%	-1,574	-18,891	2,085	-0,734	0,68	0,17457	-3,254	-20,258	-3,092	-19,245	-2,766	-17,219	-2,441	-15,193
8	-2,294	-25,188	5%	-2,180	-23,929	15%	-1,950	-21,410	25%	-1,721	-18,891	2,188	-0,852	0,709	0,23984	-3,362	-18,294	-3,194	-17,379	-2,858	-15,550	-2,522	-13,721
10	-2,547	-25,188	5%	-2,420	-23,929	15%	-2,165	-21,410	25%	-1,910	-18,891	2,3149	-0,99	0,753	0,35013	-3,679	-16,359	-3,495	-15,541	-3,127	-13,905	-2,759	-12,269
12	-2,800	-25,188	5%	-2,660	-23,929	15%	-2,380	-21,410	25%	-2,100	-18,891	2,3783	-1,058	0,775	0,41878	-3,518	-15,772	-3,342	-14,983	-2,990	-13,406	-2,638	-11,829
13,45	5,086	-33,584	5%	4,832	-31,905	15%	4,323	-28,547	25%	3,814	-25,188	2,5052	-1,19	0,824	0,58532	-23,746	-6,246	-22,558	-5,934	-20,184	-5,309	-17,809	-4,685
14	5,016	-33,584	5%	4,765	-31,905	15%	4,264	-28,547	25%	3,762	-25,188	2,5052	-1,19	0,824	0,58532	-23,604	-6,344	-22,424	-6,027	-20,063	-5,393	-17,703	-4,758
16	4,262	-33,584	5%	4,049	-31,905	15%	3,623	-28,547	25%	3,197	-25,188	2,4129	-1,387	0,499	0,53197	-25,032	-9,921	-23,780	-9,425	-21,277	-8,433	-18,774	-7,440
18	2,916	-33,584	5%	2,770	-31,905	15%	2,478	-28,547	25%	2,187	-25,188	2,4129	-1,387	0,499	0,53197	-21,521	-11,184	-20,445	-10,624	-18,293	-9,506	-16,141	-8,388
19	2,243	-38,887	5%	2,131	-36,943	15%	1,907	-33,054	25%	1,682	-29,165	2,4129	-1,387	0,499	0,53197	-21,965	-14,012	-20,867	-13,312	-18,671	-11,910	-16,474	-10,509
19,5	1,907	-38,887	5%	1,812	-36,943	15%	1,621	-33,054	25%	1,430	-29,165	2,4129	-1,387	0,499	0,53197	-21,089	-14,328	-20,034	-13,611	-17,925	-12,178	-15,816	-10,746
20	1,571	-38,887	5%	1,492	-36,943	15%	1,335	-33,054	25%	1,178	-29,165	2,4129	-1,387	0,499	0,53197	-20,212	-14,643	-19,202	-13,911	-17,180	-12,446	-15,159	-10,982
22	6,519	-38,887	5%	6,193	-36,943	15%	5,541	-33,054	25%	4,889	-29,165	2,4129	-1,387	0,499	0,53197	-33,113	-10,002	-31,457	-9,502	-28,146	-8,501	-24,834	-7,501
22,5	6,182	-38,887	5%	5,873	-36,943	15%	5,255	-33,054	25%	4,637	-29,165	2,4129	-1,387	0,499	0,53197	-32,236	-10,317	-30,624	-9,801	-27,401	-8,770	-24,177	-7,738
24	5,173	-38,887	5%	4,915	-36,943	15%	4,397	-33,054	25%	3,880	-29,165	2,4129	-1,387	0,499	0,53197	-29,605	-11,264	-28,125	-10,700	-25,164	-9,574	-22,204	-8,448
25	4,500	-38,887	5%	4,275	-36,943	15%	3,825	-33,054	25%	3,375	-29,165	2,4129	-1,387	0,499	0,53197	-27,849	-11,895	-26,456	-11,301	-23,671	-10,111	-20,886	-8,922
26	4,500	-38,887	5%	4,275	-36,943	15%	3,825	-33,054	25%	3,375	-29,165	2,4129	-1,387	0,499	0,53197	-27,849	-11,895	-26,456	-11,301	-23,671	-10,111	-20,886	-8,922
27,5	4,500	-38,887	5%	4,275	-36,943	15%	3,825	-33,054	25%	3,375	-29,165	2,4129	-1,387	0,499	0,53197	-27,849	-11,895	-26,456	-11,301	-23,671	-10,111	-20,886	-8,922
28	-1,795	-38,887	5%	-1,705	-36,943	15%	-1,525	-33,054	25%	-1,346	-29,165	2,4129	-1,387	0,499	0,53197	-11,437	-17,800	-10,865	-16,910	-9,722	-15,130	-8,578	-13,350
30	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,525	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,854	-13,262	-6,930	-11,702
30,5	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,525	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,854	-13,262	-6,930	-11,702
31	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,526	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,853	-13,262	-6,929	-11,702
32	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,526	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,853	-13,262	-6,929	-11,702
33	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,526	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,853	-13,262	-6,929	-11,702
34	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,526	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,853	-13,262	-6,929	-11,702
36	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,525	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,854	-13,262	-6,930	-11,702
38	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,525	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,854	-13,262	-6,930	-11,702
40	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,525	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,854	-13,262	-6,930	-11,702
41	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,525	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,854	-13,262	-6,930	-11,702
42	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,525	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,854	-13,262	-6,930	-11,702
44	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,525	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,854	-13,262	-6,930	-11,702
46	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,525	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,854	-13,262	-6,930	-11,702
48	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,526	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,853	-13,262	-6,929	-11,702
49	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,526	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,853	-13,262	-6,929	-11,702
50	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,526	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,853	-13,262	-6,929	-11,702
51	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,526	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,853	-13,262	-6,929	-11,702
51,5	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,525	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,854	-13,262	-6,930	-11,702
52	-1,795	-33,584	5%	-1,705	-31,905	15%	-1,525	-28,547	25%	-1,346	-25,188	2,4129	-1,387	0,499	0,53197	-9,239	-15,602	-8,777	-14,822	-7,854	-13,262	-6,930	-11,702
54	-1,795	-38,887	5%	-1,705	-36,943	15%	-1,525	-33,054	25%	-1,346	-29,165	2,4129	-1,387	0,499	0,53197	-11,437	-17,800	-10,865	-16,910	-9,722	-15,130	-8,578	-13,350
54,5	4,500	-38,887	5%	4,275	-36,943	15%	3,825	-33,054	25%	3,375	-29,165	2,4129	-1,387	0,499	0,53197	-27,849	-11,895	-26,456	-11,301	-23,671	-10,111	-20,886	-8,922
56	4,500	-38,887	5%	4,275	-36,943	15%	3,825	-33,054	25%	3,375	-29,165	2,4129	-1,387	0,499	0,53197	-27,849	-11,895	-26,456	-11,301	-23,671	-10,111	-20,886	-8,922
57	4,500	-38,887	5%	4,275	-36,943	15%	3,825	-33,054	25%	3,375	-29,165	2,4129	-1,387	0,499	0,53197	-27,849	-11,895	-26,456	-11,301	-23,671	-10,111	-20,886	-8,922
58	5,173	-38,887	5%	4,915	-36,943	15%	4,397	-33,054	25%	3,880	-29,165	2,4129	-1,387	0,499	0,53197	-29,605	-11,264	-28,125	-10,700	-25,164	-9,574	-22,204	-8,448
59,5	6,182	-38,887	5%	5,873	-36,943	15%	5,255	-33,054	25%	4,637	-29,165	2,4129	-1,387	0,499	0,53197	-32,236	-10,317	-30,624	-9,801	-27,401	-8,770	-24,177	-7,738
60	6,519	-38,887	5%	6,193	-36,943	15%	5,541	-33,054	25%	4,889	-29,165	2,4129	-1,387	0,499	0,53197	-33,113	-10,002	-31,457	-9,502	-28,146	-8,501	-24,834	-7,501
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