

Remarks: See §5.4, page 173 till 176

Answers: All forces in kN

The normal force in AB positive as a tensile force

1a. $A_v = 18 (\uparrow); B_h = 0; B_v = 18 (\uparrow)$

1b. $N^{(AB)} = +3\sqrt{17} = +12,37$

2a. $A_h = 0; A_v = 18 (\uparrow); B_v = 18 (\uparrow)$

2b. $N^{(AB)} = +3\sqrt{17} = +12,37$

3a. $A_v = 11 (\uparrow); B_h = 4 (\rightarrow); B_v = 1 (\uparrow)$

3b. $N^{(AB)} = +1,25\sqrt{17} = +5,15$

4a. $A_h = 4 (\rightarrow); A_v = 10 (\uparrow); B_v = 2 (\uparrow)$

4b. $N^{(AB)} = +0,25\sqrt{17} = +1,03$

5a. $A_v = 8 (\downarrow); B_h = 16 (\leftarrow); B_v = 8 (\uparrow)$

5b. $N^{(AB)} = -2,75\sqrt{17} = -11,34$

6a. $A_h = 16 (\leftarrow); A_v = 4 (\downarrow); B_v = 4 (\uparrow)$

6b. $N^{(AB)} = +1,25\sqrt{17} = +5,15$

7a. $A_v = B_h = B_v = 0$

7b. $N^{(AB)} = -0,75\sqrt{17} = -3,09$

8a. $A_h = A_v = B_v = 0$

8b. $N^{(AB)} = -0,75\sqrt{17} = -3,09$