

**Drawing 1: Anchorage bursting reinforcement**

Tendon type	4φ0,6"	7φ0,6"	9φ0,6"	12φ0,6"	15φ0,6"	19φ0,6"	25φ0,6"	31φ0,6"	37φ0,6"
Class of reinforcement steel	Fe500	Fe500	Fe500	Fe500	Fe500	Fe500	Fe500	Fe500	Fe500
Reinforcement diameter (mm)	10	12	12	12	16	16	20	20	20
(N) Number reinforcement levels	3	4	4	5	5	6	6	6	7
Dimension of square stirrups (1 per reinforcement level)	245x245	290x290	340x340	380x380	430x430	500x500	600x600	640x640	720x720
Dimension of rectangular stirrups (2 per reinforcement level)	245x100	290x130	340x155	380x177	430x194	500x220	600x270	640x288	720x320
(Re) Distance between external surface and first stirrup [mm]	50	50	50	50	50	50	50	50	50
(S) Space between reinforcement levels	85	75	90	80	90	85	100	100	105
Dimension of U bars (a x b)	80x245	106x290	130x330	147x375	162x420	180x490	230x570	248x610	272x690
(Dt) Minimum distance between tendons (mm)	245	290	340	380	430	500	600	640	720
(Dp) Minimum distance tendon to external surfaces [mm]	(0.5 · Dt) + required minimum concrete cover								

**Table 1: Bursting reinforcement case I: Concrete strength at stressing = 27.5 MPa**

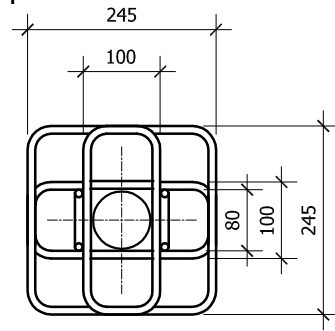
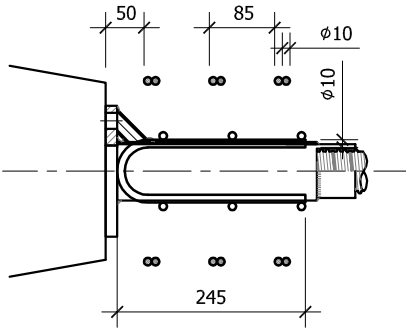
Tendon type	4φ0,6"	7φ0,6"	9φ0,6"	12φ0,6"	15φ0,6"	19φ0,6"	25φ0,6"	31φ0,6"	37φ0,6"
Class of reinforcement steel	Fe500	Fe500	Fe500	Fe500	Fe500	Fe500	Fe500	Fe500	Fe500
Reinforcement diameter (mm)	10	12	12	12	16	16	20	20	20
(N) Number reinforcement levels	3	4	4	5	4	5	5	6	6
Dimension of square stirrups (1 per reinforcement level)	210x210	250x250	300x300	330x330	380x380	430x430	520x520	550x550	630x630
Dimension of rectangular stirrups (2 per reinforcement level)	210x100	250x120	300x140	330x155	380x195	430x220	520x265	550x280	630x320
(Re) Distance between external surface and first stirrup [mm]	50	50	50	50	50	50	50	50	50
(S) Space between reinforcement levels	70	60	80	65	100	90	90	90	110
Dimension of U bars (a x b)	80x210	96x250	116x300	125x325	163x370	180x420	225x490	240x520	272x600
(Dt) Minimum distance between tendons (mm)	210	250	300	330	380	430	520	550	630
(Dp) Minimum distance tendon to external surfaces [mm]	(0.5 · Dt) + required minimum concrete cover								

**Table 2: Bursting reinforcement case II: Concrete strength at stressing = 40.0 MPa**

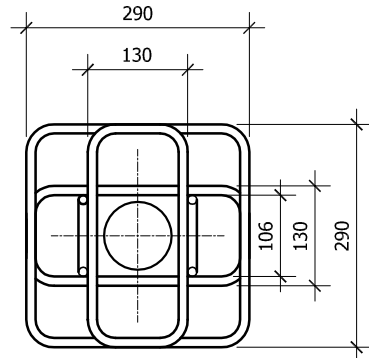
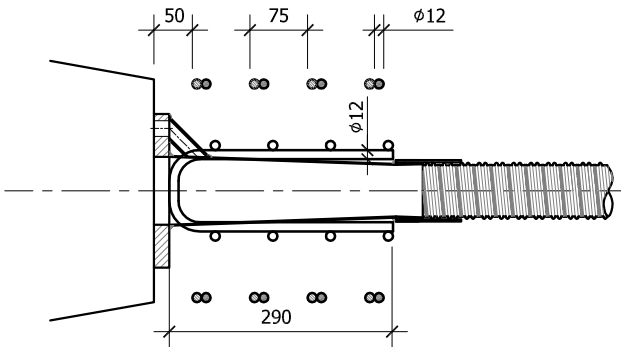
Distances between structure edges and anchorages or between anchorages may be reduced until a 15% in one direction if they are increased proportionally in the orthogonal direction.

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0			CCP	JMPP	2			CCP	JMPP
REVISION Nº	DATE	REMARKS	NAME	SIGN.	NAME	SIGN.	REVISION Nº	DATE	REMARKS
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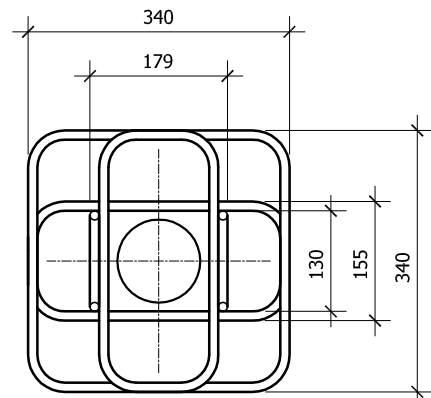
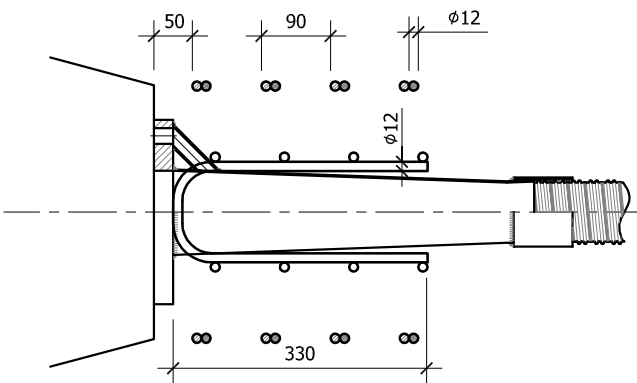
**ANCHORAGE 4Ø0.6"**  
Concrete strength at stressing=27,5Mpa




**ANCHORAGE 7Ø0.6"**  
Concrete strength at stressing=27,5Mpa



**ANCHORAGE 9Ø0.6"**  
Concrete strength at stressing=27,5Mpa

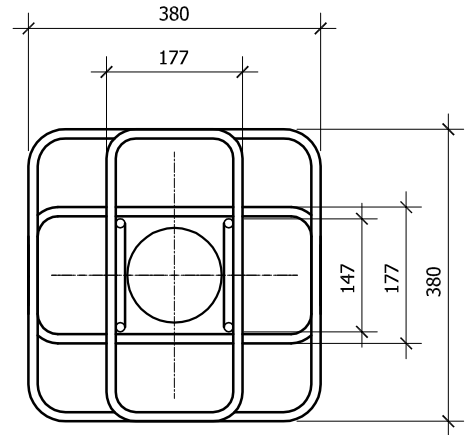
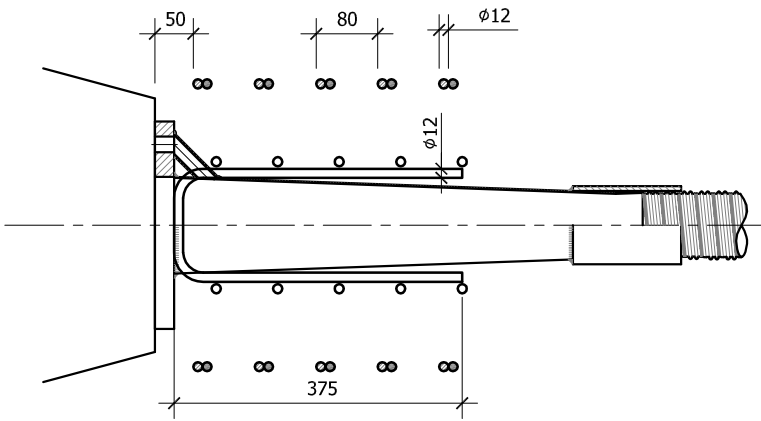


All dimensions are in mm.

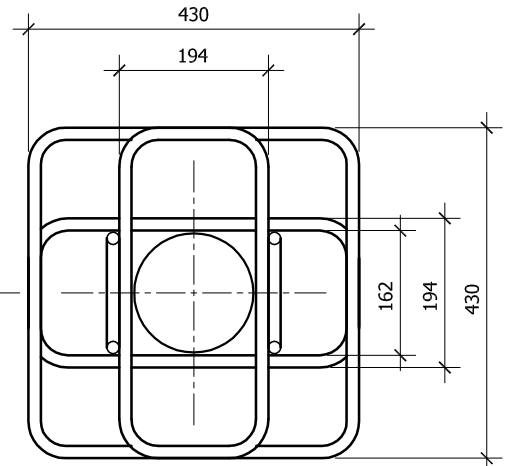
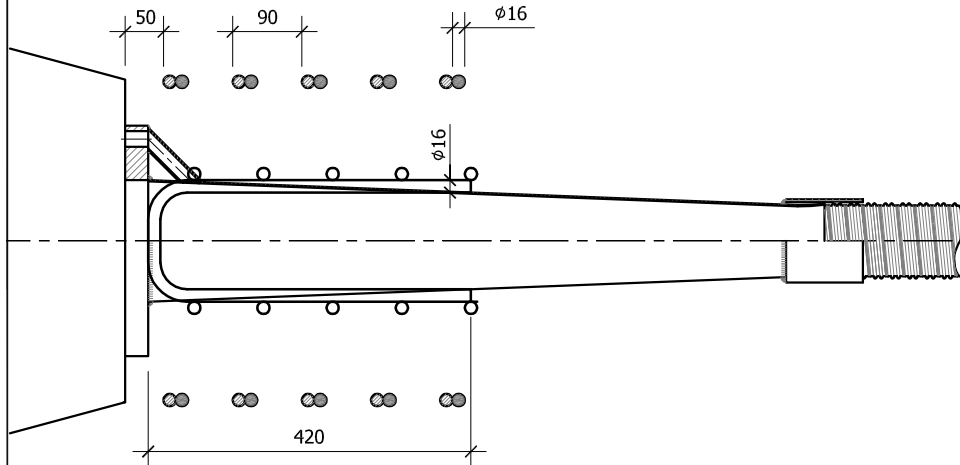
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		Drawn: Carolina CARLES	
		Checked: José Manuel PEÑA	
		Approved: José Manuel PEÑA	
Company:			

1	23/02/2016		CCP	JMPP		3									
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REVISION Nº	DATE	REMARKS	NAME	SIGN.	NAME	SIGN.	REVISION Nº	DATE	REMARKS	NAME	SIGN.	NAME	SIGN.	NAME	SIGN.
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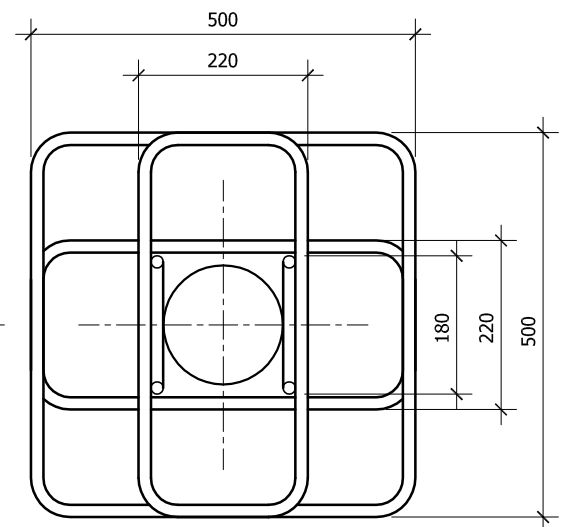
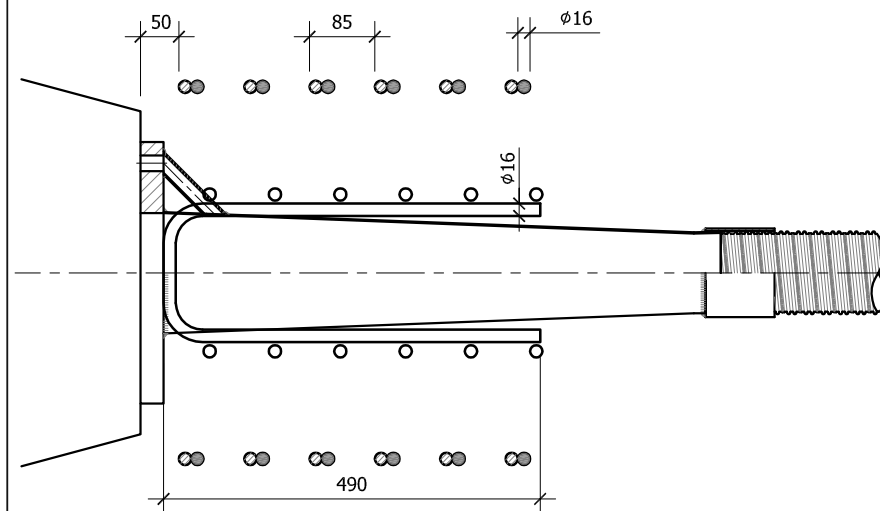
**ANCHORAGE 12Ø0.6"**  
Concrete strength at stressing=27,5Mpa




**ANCHORAGE 15Ø0.6"**  
Concrete strength at stressing=27,5Mpa



**ANCHORAGE 19Ø0.6"**  
Concrete strength at stressing=27,5Mpa

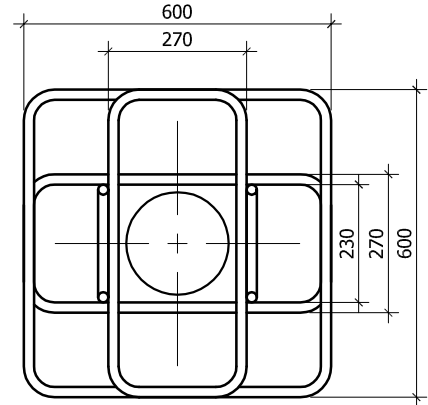
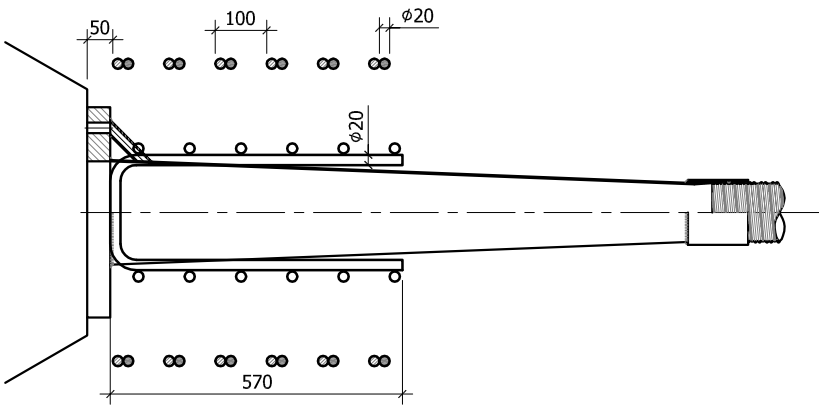


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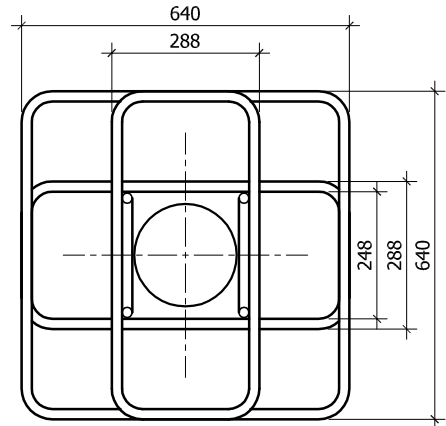
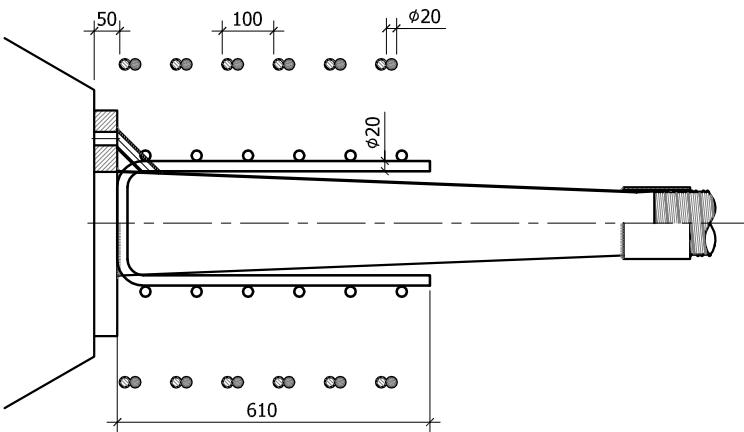
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		Approved: José Manuel PEÑA	
Company:			

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0			CCP	JMPP	2														
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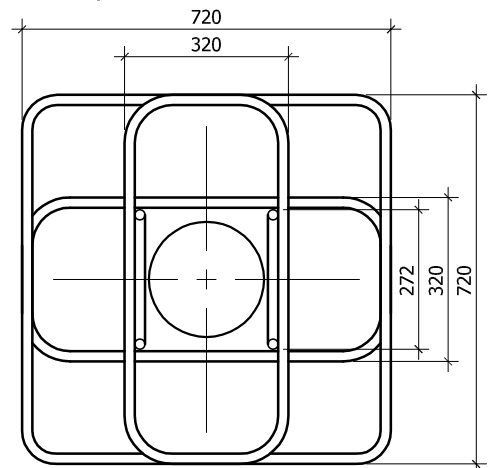
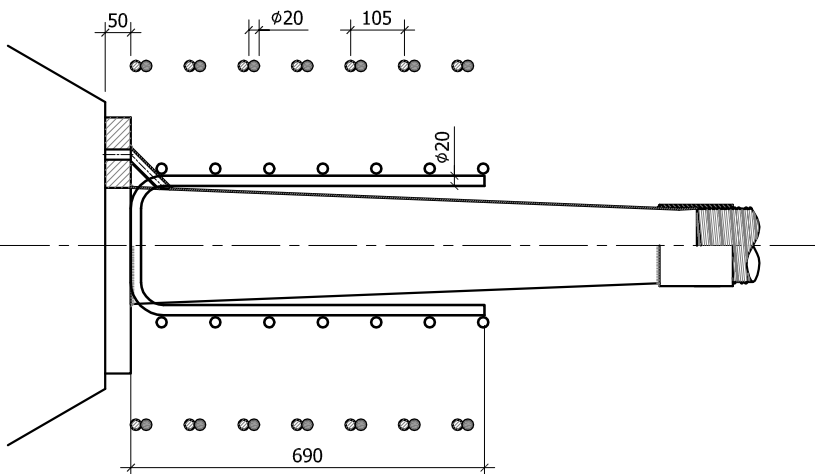
**ANCHORAGE 25Ø0.6"**  
Concrete strength at stressing=27,5Mpa



**ANCHORAGE 31Ø0.6"**  
Concrete strength at stressing=27,5Mpa



**ANCHORAGE 37Ø0.6"**  
Concrete strength at stressing=27,5Mpa



All dimensions are in mm.



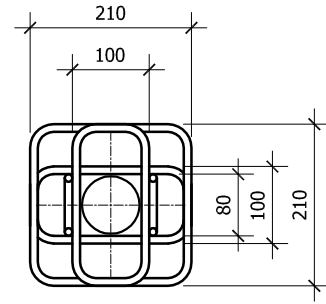
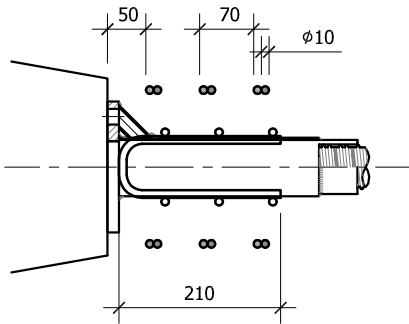
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Checked: José Manuel PEÑA	
Approved: José Manuel PEÑA	

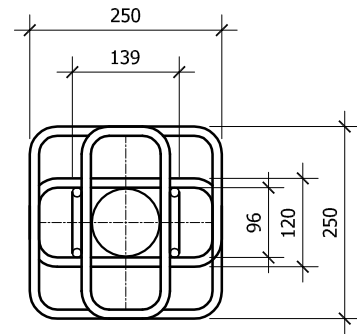
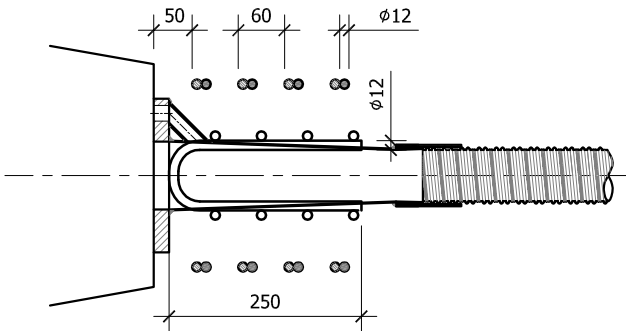
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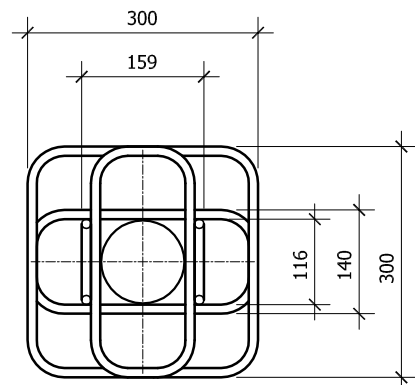
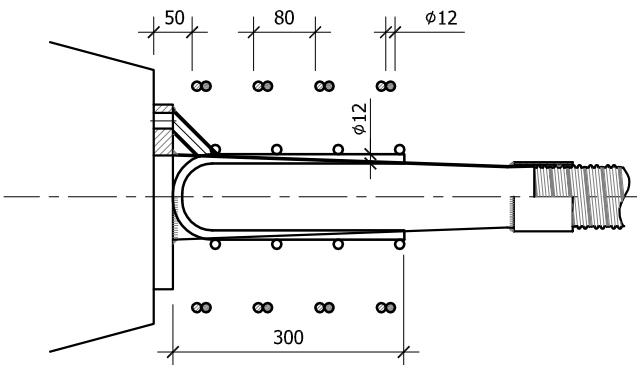
**ANCHORAGE 4Ø0.6"**  
Concrete strength at stressing=40,0Mpa




**ANCHORAGE 7Ø0.6"**  
Concrete strength al stressing=40,0Mpa



**ANCHORAGE 9Ø0.6"**  
Concrete strength al stressing=40,0Mpa

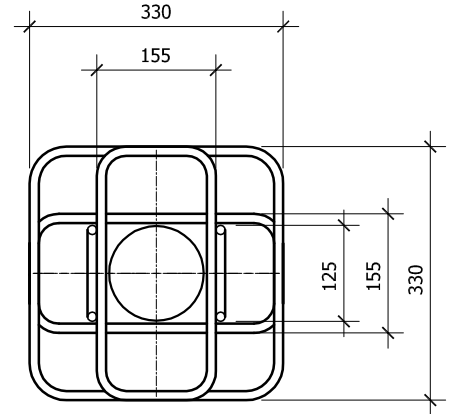
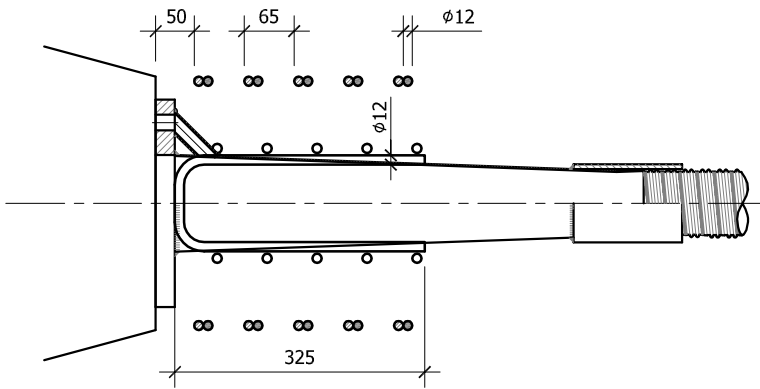


All dimensions are in mm.

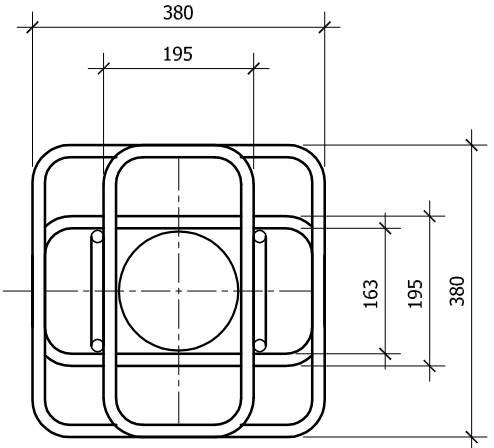
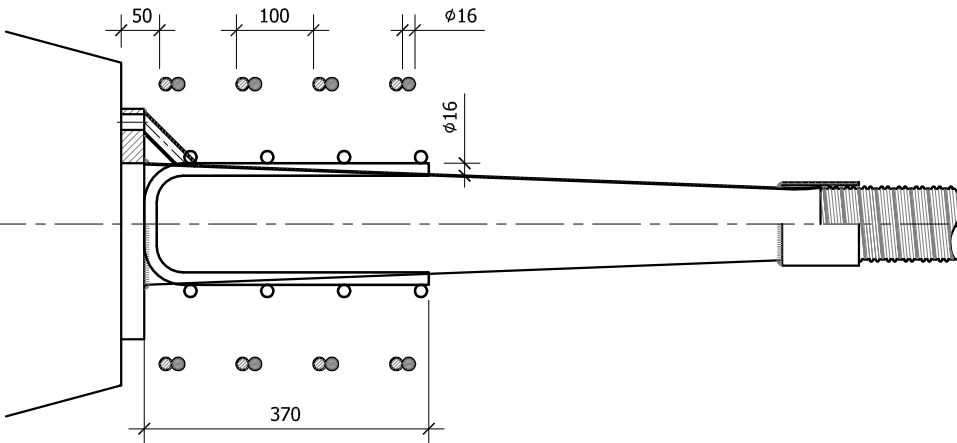
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		Drawn: Carolina CARLES	
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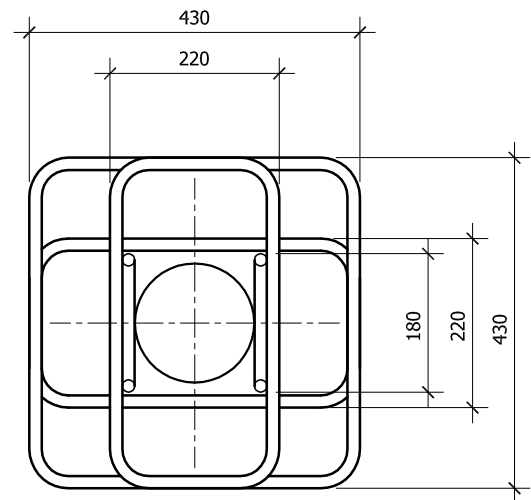
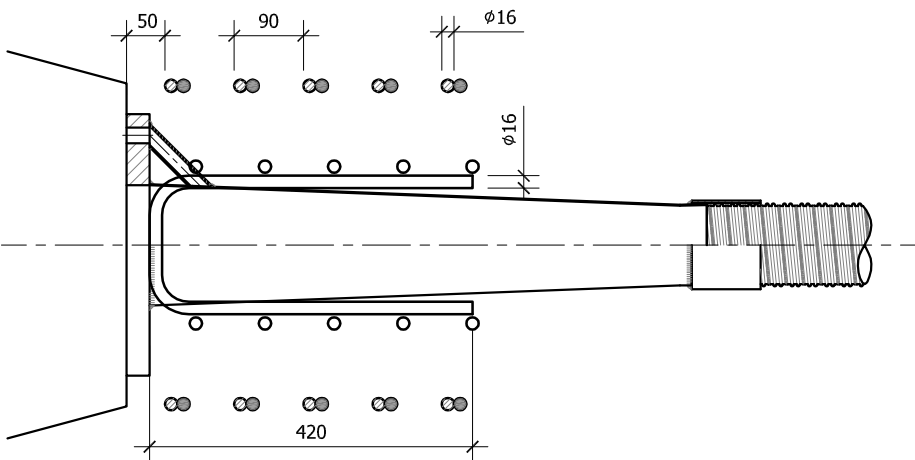
ANCHORAGE 12Ø0.6"  
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ANCHORAGE 19Ø0.6"  
Concrete strength al stressing=40,0Mpa



All dimensions are in mm.



BURSTING REINFORCEMENT TO BE USED IN RMS PROJECTS

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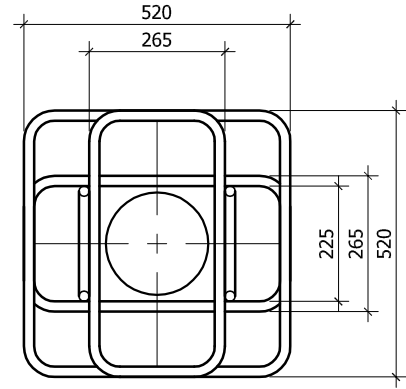
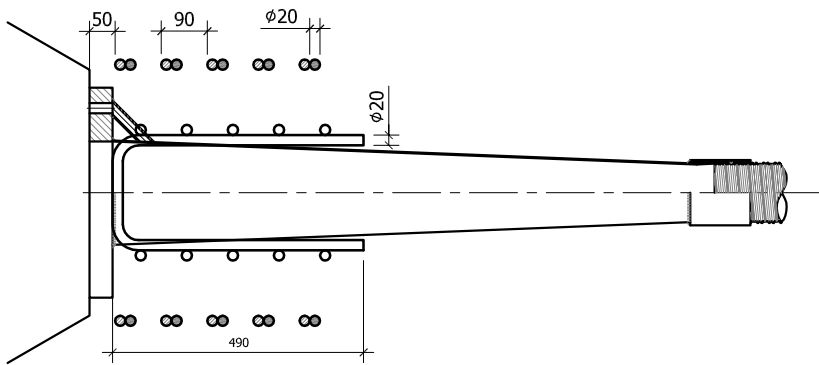
Checked: José Manuel PEÑA

Approved: José Manuel PEÑA

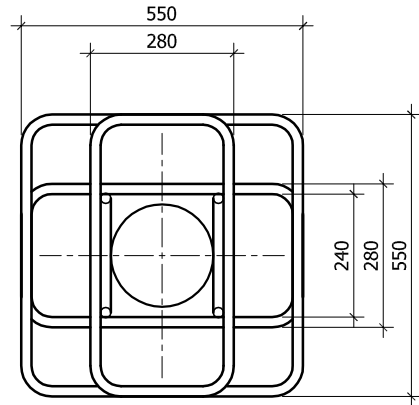
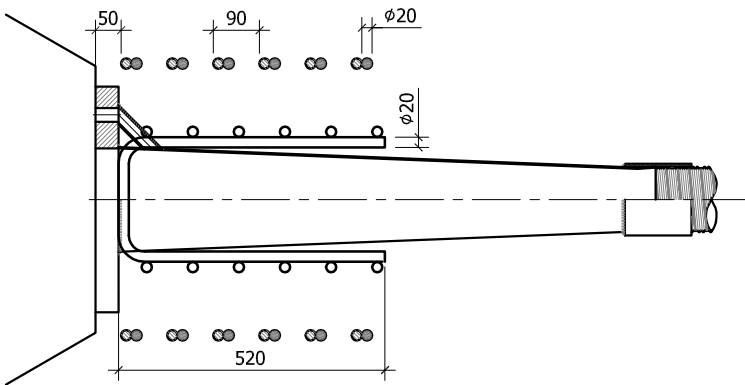
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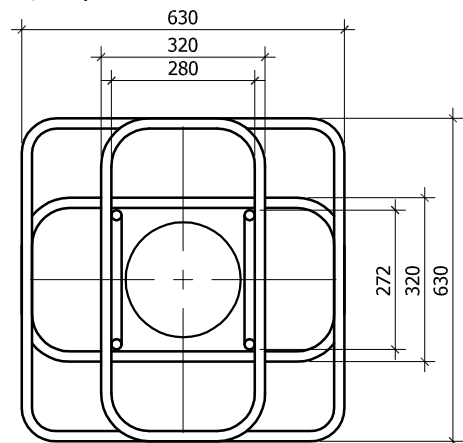
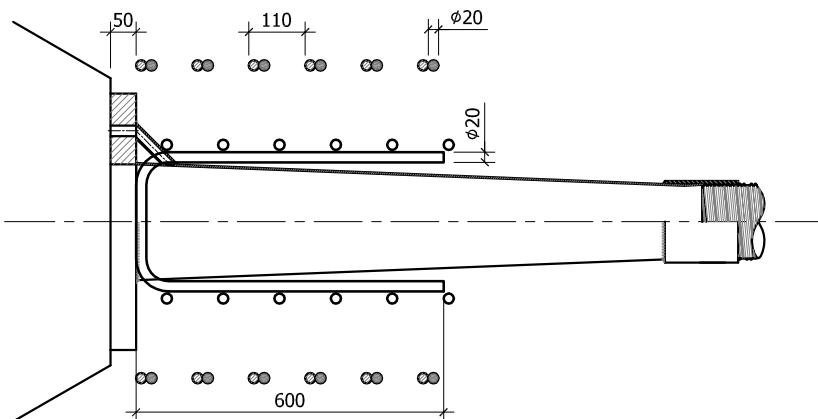
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Concrete strength al stressing=40,0Mpa



**ANCHORAGE 37Ø0.6"**  
Concrete strength al stressing=40,0Mpa



All dimensions are in mm.



BURSTING REINFORCEMENT TO BE USED IN RMS PROJECTS

Drawing No: 6 / 6

Date: 23/05/2016

Scale: 1/15

Drawn: Carolina CARLES

Checked: José Manuel PEÑA

Approved: José Manuel PEÑA

Company: