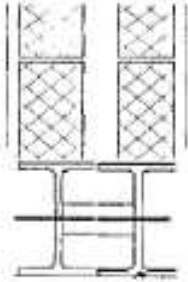


	TEAM DESIGN- 2 <sup>nd</sup> floor Regal Court, 42-44 High Street, Slough, SL1 1EL Email : <a href="mailto:info@beamdesign.co.uk">info@beamdesign.co.uk</a> Office: 0800 130 3312			
	Project No	Example	Sht. No.	8 of 16
	Site Address	Example		
	Subject	Extension and alteration works – Supporting Calculations		
	Engineer	Peter V	Date:	



For Beam "A" use steel section 2No 178 x 102 UB 19kg/m bolted together with M16 bolts grade 8.8 + 48.3mm dia. scaffold tube spacers at 600mm c/c. with space between the steel section to suit the cavity width.

**BEAM "A" MASONRY BEARING DESIGN TO BS5628-1:2005**

**Masonry details**

Masonry type;  
Compressive strength;  
Masonry units;  
Partial safety factor;  
Leaf thickness;  
Wall height;

**Clay or calcium silicate bricks**

$p_{unit} = 5.0 \text{ N/mm}^2$ ;

**Category II**;

$\gamma_m = 3.5$ ;

$t = 100 \text{ mm}$ ;

$h = 2100 \text{ mm}$ ;

Mortar designation;

Construction control;

Characteristic strength;

Effective wall thickness;

Effective height of wall;

iii

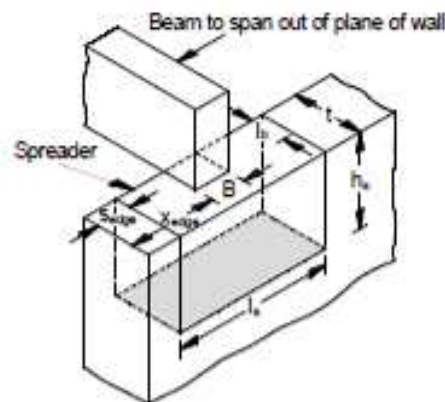
**Normal**

$f_k = 2.5 \text{ N/mm}^2$

$t_{ef} = 100 \text{ mm}$

$h_{ef} = 2100 \text{ mm}$

**EXAMPLE**



**NOTE:** For Building Regulations Submission only, not for ordering materials. Principal Contractor is responsible for taking measurements on site, preparing construction drawings and safely erecting the proposed structural works. Team Design is not responsible for site supervision.

**IF IN DOUBT - ASK!**