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The European Union will need in the coming years to invest a substantial amount of resources in European public goods (EPGs), including for the digital and climate transitions, and for defence and security. Funding for this could be provided in a centralised way at EU level, via either a fund or from the EU budget, but for this to be politically viable, and to create the necessary trust, national budgetary policies need to comply with the common EU fiscal rules. Setting adequate conditions for access to central financing is, however, not straightforward. The tightness of the conditionality needs to

# 1 Introduction

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6. *A fortiori*, . . .

. . .

The image shows two musical staves with complex notation. The first staff contains several measures of music with notes, rests, and dynamic markings such as 'p'. The second staff continues the notation, including a '2x' marking, suggesting a second ending or a specific performance instruction.

Table 2: Characterisation of EPGs with important examples

4. 5. & \



1.  $1 - \frac{1}{2} + \frac{1}{3} - \frac{1}{4} + \dots$

$$1 = \frac{-1+1}{+1} + \frac{1}{+2} - 1 - 1 + 1 \cdot 2, (7)$$

1.  $1 - \frac{1}{2} + \frac{1}{3} - \frac{1}{4} + \dots < 1$   $\Delta$   $\frac{1}{2} > 0$ ,  $\frac{1}{3} > 0$ ,  $\frac{1}{4} > 0$ ,  $\dots$   
 $\frac{1}{2} > 0$ ,  $\frac{1}{3} > 0$ ,  $\frac{1}{4} > 0$ ,  $\dots$   
 $\frac{1}{2} > 0$ ,  $\frac{1}{3} > 0$ ,  $\frac{1}{4} > 0$ ,  $\dots$   
 $\frac{1}{2} > 0$ ,  $\frac{1}{3} > 0$ ,  $\frac{1}{4} > 0$ ,  $\dots$

$$1 = 1 - \frac{1}{2} + \frac{1}{3} - \frac{1}{4} + \dots$$

1.  $1 - \frac{1}{2} + \frac{1}{3} - \frac{1}{4} + \dots < 0$ .  $\Delta$   $\frac{1}{2} > 0$ ,  $\frac{1}{3} > 0$ ,  $\frac{1}{4} > 0$ ,  $\dots$   
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 $\frac{1}{2} > 0$ ,  $\frac{1}{3} > 0$ ,  $\frac{1}{4} > 0$ ,  $\dots$   
 $\frac{1}{2} > 0$ ,  $\frac{1}{3} > 0$ ,  $\frac{1}{4} > 0$ ,  $\dots$

$(1 - \frac{1}{2})^2 < (1 - \frac{1}{2})^2$

$(\frac{1}{2})^2 < (\frac{1}{2})^2$

$= 0$

$> 0$

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$\frac{1}{2} \left( \frac{1}{2} + \frac{1}{2} \right) = \frac{1}{2}$

### 3.3 The optimal degree of conditionality

The optimal degree of conditionality is the degree of conditionality that maximizes the expected utility of the consumer.

$$= \frac{1}{2} - \frac{1}{2} \frac{2}{1-1}$$

1 = 2 · 11.5



Musical score with lyrics: *quid pro quo,*  
 5 ( ) 2 ( ) - 5 ( ) \ 1.













Table A1: Optimal degrees of conditionality for different combinations of physical content of EPGs and different deficit compositions in Frugal and Profligate – baseline parameter combination

$z_1 = z_2$	0.00	0.25	0.50	0.75	1.00
$z_1$	$z_2 = -0.50$				
0.25	0.00	0.171	0.270	0.32	0.500
0.50	0.105	0.17	0.25	0.403	0.502
0.75	0.125	0.207	0.303	0.415	0.505
$z_1$	$z_2 = -0.25$				
0.25	0.132	0.202	0.2	0.31	0.47
0.50	0.14	0.21	0.302	0.401	0.4
0.75	0.170	0.23	0.31		





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