Diagrama

Descripción generada automáticamente con confianza media

Z = a \* x1 + b \* x2

16 = a\*1 + 6\*b

16 = a\*2,5 + 3\*b

a = 4 y b = 2

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4X1 + 10X2 >= 40

X1 – X2 <= 5

4X1 + 8X2 <= 32

Z(MAX) = 4X1 + 2X2

Paso a igualdades:

4x1 + 10x2 – x3 + Mu = 40

X1 – x2 + x4 = 5

4x1 + 8x2 + x5 = 32

Z(Max) = 4x1 + 2x2 – M\*Mu

|  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | | | 4 | 2 | 0 | 0 | 0 | -M |  |
| Ck | Xk | Bk | X1 | X2 | X3 | X4 | X5 | Mu | Tita |
| -M | Mu | 40 | 4 | 10 | -1 | 0 | 0 | 1 | 4 |
| 0 | X4 | 5 | 1 | -1 | 0 | 1 | 0 | 0 | - |
| 0 | X5 | 32 | 4 | 8 | 0 | 0 | 1 | 0 | 4 |
| Z = -40M | | | -4M-4 | -10M -2 | M | 0 | 0 | 0 |  |

Entra X2 y sale X5

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | | | 4 | 2 | 0 | 0 | 0 | -M |
| Ck | Xk | Bk | X1 | X2 | X3 | X4 | X5 | Mu |
| -M | Mu | 0 | -1 | 0 | -1 | 0 | -5/4 | 1 |
| 0 | X4 | 9 | 3/2 | 0 | 0 | 1 | 1/8 | 0 |
| 2 | X2 | 4 | 1/2 | 1 | 0 | 0 | 1/8 | 0 |
| Z = 8 | | | M-3 | 0 | M | 0 | 1/4 | 0 |