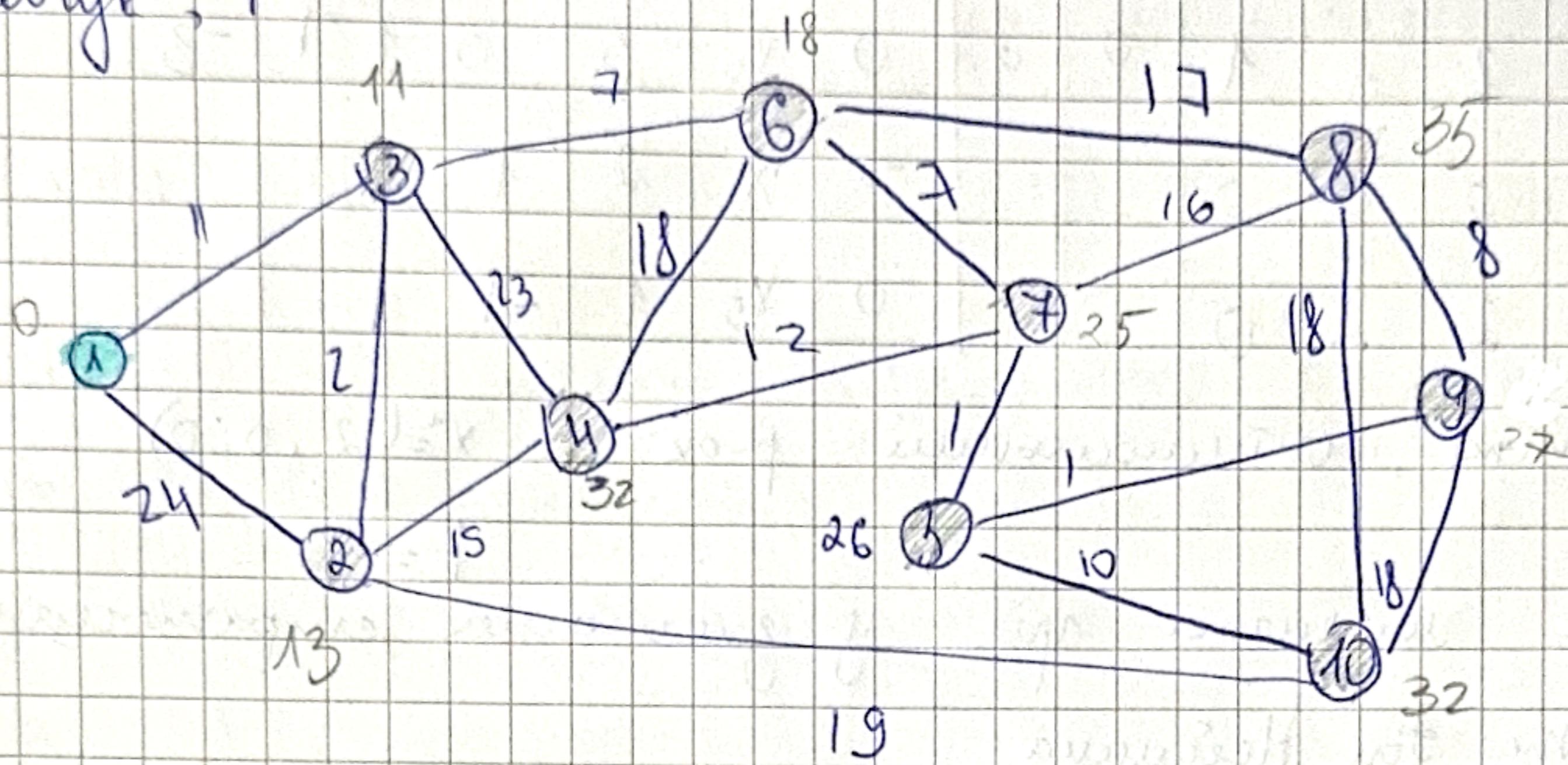


Виконання завдання 9. Метод Minii.

Киевітх, 4



Крок 0. Корінь дерева $h_1 = 0$.

$$I^{(0)} = p^{(0)} = \{1(0)\}$$

Крок 1. Будуємо позріз деревці $\bar{U}(I^{(0)}) = \{(1,3), (1,2)\}$

$$\theta = \min(h_1 + c_{12}, h_1 + c_{13}) = \min(0 + 24, 0 + 11) = 11$$

$$I^{(1)} = I^{(0)} \vee p^{(1)} = \{1(0), 3(1)\}$$

$$p^{(1)} = \{3(11)\}$$

Крок 2. Будуємо позріз деревці $\bar{U}(I^{(1)}) = \{(1,2), (3,2), (3,4), (3,6)\}$

$$\theta = \min(h_1 + c_{12}, h_3 + c_{32}, h_3 + c_{34}, h_3 + c_{36}) = \min(24, 13, 34, 18) = 13$$

$$I^{(2)} = \{1(0), 2(13), 3(11)\}$$

$$p^{(2)} = \{2(13)\}$$

Крок 3. Будуємо позріз деревці $\bar{U}(I^{(2)}) = \{(3,4), (3,6), (2,4), (2,10)\}$

$$\Theta = \min \{ 11+23, 11+4, 13+19, 13+19 \} = \{ 34, 18, 32, 32 \} = 18$$

$$I^{(3)} = \{ 1(0), 2(13), 3(11), 6(18) \}$$

$$P^{(3)} = \{ 6(18) \}$$

Krok 4. $\bar{U}(I^{(3)}) = \{ (2,4), (2,10), (3,4), (6,4), (6,7), (6,8) \}$

$$\Theta = \min \{ 32, 32, 34, 36, 25, 35 \} = 25$$

$$I^{(u)} = \{ 1(0), 2(13), 3(11), 6(18), 7(25) \}$$

$$P^{(u)} = \{ 7(25) \}$$

Крок 5. $\bar{U}(I^{(4)}) = \{(2,4), (2,10), 3(4), 6(4), 6(8), 7(5), 7(8), 7(4)\} \neq \emptyset$

$$\Theta = \min(32, 32, 34, 36, 35, 26, 41, 37) = 26$$

$$I^{(5)} = \{1(0), 2(13), 3(11), 5(26), 6(18), 7(25)\}$$

$$P^{(5)} = \{5(26)\}$$

Крок 6. $\bar{U}(I^{(5)}) = \{(2,4), (2,10), (3,4), (5,9), (5,10), (6,4), (6,8), (7,8), (7,4)\}$

$$\Theta = \min(32, 32, 34, 27, 36, 36, 35, 41, 37) = 27$$

$$I^{(6)} = \{1(0), 2(13), 3(11), 5(26), 7(25), 6(18), 9(27)\}$$

$$P^{(6)} = \{9(27)\}$$

Крок 7. $\bar{U}(I^{(6)}) = \{(2,4), (2,10), (3,4), (5,10), (6,4), (6,8), (7,8), (9,8), (9,10)\}$

$$\Theta = \min(32, 32, 34, 36, 36, 35, 41, 37, 35, 45) = 32$$

$$I^{(7)} = \{1(0), 2(13), 3(11), 4(32), 5(26), 6(18), 7(25), 9(27), 10(32)\}$$

$$P^{(7)} = \{4(32), 10(32)\}$$

Крок 8. $\bar{U}(I^{(7)}) = \{(6,8), (7,8), (9,8)\}$

$$\Theta = \min(35, 41, 35)$$

$$P^{(8)} = \{8(35)\}$$

$$I^{(8)} = \{1(0), 2(13), 3(11), 4(32), 5(26), 6(18), 7(25), 8(35), 9(27), 10(32)\}$$