**Решение**

Найдем определитель главной матрицы, составленной из коэффициентов при X1 - n:

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Определитель главной матрицы системы уравнений не равен нулю, следовательно данная система уравнений имеет единственное решение. Найдем его.
Достоим главный определитель системы уравнений еще одним столбцом, в который вставим значения за знаком равенства.

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Теперь последовательно, при помощи [элементарных преобразований](http://www.webmath.ru/library/1_5.php) преобразуем левую часть матрицы (4 × 4) до треугольного вида (обнулим все коэффициенты находящиеся не на главной диагонали, а коэффициенты на главной диагонали преобразуем до единиц).

Вычтем 1 - ую строку из всех строк, которые находятся ниже нее. Это действие не противоречит элементарным преобразованиям матрицы.

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Вычтем 2 - ую строку из всех строк, которые находятся ниже нее. Это действие не противоречит элементарным преобразованиям матрицы.

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Вычтем 3 - ую строку из всех строк, которые находятся ниже нее. Это действие не противоречит элементарным преобразованиям матрицы.

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Вычтем 4 - ую строку из всех строк, которые находятся выше нее. Это действие не противоречит элементарным преобразованиям матрицы.

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Вычтем 3 - ую строку из всех строк, которые находятся выше нее. Это действие не противоречит элементарным преобразованиям матрицы.

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Вычтем 2 - ую строку из всех строк, которые находятся выше нее. Это действие не противоречит элементарным преобразованиям матрицы.

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Приведем все коэффициенты на главной диагонали матрицы к 1. Поделим каждую строку матрицы на коэффициент этой строки находящийся на главной диагонали, если он не равен 1.

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**Ответ**.

Числа получившиеся правее единичной матрицы и будут решением Вашей системы уравнений.

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| x 1  =   1.47 |
| x 2  =   0.51 |
| x 3  =   -0.61 |
| x 4  =   1.19 |