

a 01 01 b 02 02 c 03 03 d 04 04 e 05 05 f 06 06 g 07 07 h 08 08 i 09
 09
 j 10 01 k 11 02 l 12 03 m 13 04 n 14 05 o 15 06 p 16 07 q 17 08 r 18
 09
 s 19 01 t 20 02 u 21 03 v 22 04 w 23 05 x 24 06 y 25 07 z 26 08
 1 a j s 2 b k t (11 -> 2) 3 c l u 4 d m v (22 -> 4) 5 e n w 6 f o x
 (33 -> 6) 7 g p y 8 h q z 9 i r

https://en.wikipedia.org/wiki/Luoshu_Square

Here is a simple algorithm in Rust that converts a letter from the first set to the second set:

```
fn convert_letter (c : char) -> char {
    let offset = (c as u8 - 'a' as u8) * 2 + 1;
    (offset as char).to_uppercase().next().unwrap() }
```

And here is the algorithm to convert a letter from the second set back to the first set:

```
fn convert_letter_back (c : char) -> char {
    let offset = (c as u8 - 'A' as u8) / 2;
    (offset as char + 'a' as u8) as char }
assert_eq! (convert_to_number (" abc " ), 123);
assert_eq! (convert_to_number (" jst " ), 578);
assert_eq! (convert_to_letter (123), " abc ");
assert_eq! (convert_to_letter (578), " jst ");
fn convert_to_number (s : &str) -> u32 {
    let mut result = 0;
    for c in s.chars() {
        let offset = (c as u32) - ('a' as u32);
        result = result * 10 + (offset / 3) + 1;
    }
    result }
fn convert_to_letter (n : u32) -> String {
    let mut result = String::new();
    let mut n = n;
    while n > 0 {
        let digit = (n % 10) as u8 - 1;
        n /= 10;
        result.push((digit * 3))
    }
    result }
```

```
+ 'a' as u8) as char);    }    result.chars  
( ).rev().collect() }
```