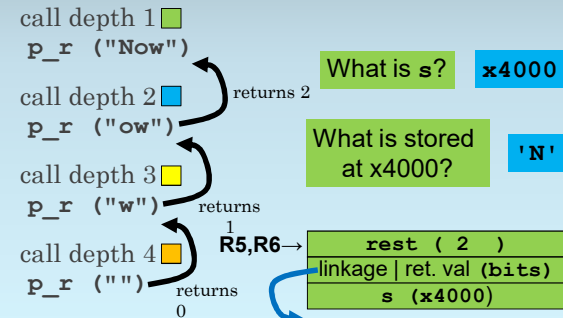## What Happens Next?

```
int32_t print_reverse(const char* s)
{
    int32_t rest;
    if ('\0' == *s) {
        return 0;
    }
    rest = print_reverse (s + 1);
    printf ("%c", *s);
    return (rest + 1);
}
```

Print *s.

## Print Character at s

call depth 1
p_r ("Now")

returns 2

call depth 2
p_r ("ow")

call depth 3
p_r ("w")

returns 1

call depth 4
p_r ("")

returns 0

What is s?    x4000

What is stored
at x4000?    'N'

R5,R6→

| rest ( 2 ) |
|---|
| linkage | ret. val (bits) |
| s (x4000) |

## What Happens Next?

```
int32_t print_reverse(const char* s)
{
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    if ('\0' == *s) {
        return 0;
    }
    rest = print_reverse (s + 1);
    printf ("%c", *s);
    return (rest + 1);
}
```

Output is now
"woN".

Return (rest + 1).

## Return (rest + 1)

call depth 1
p_r ("Now")

returns 2

call depth 2
p_r ("ow")

call depth 3
p_r ("w")

returns 1

call depth 4
p_r ("")

returns 0

What is rest?    2

Adding 1, we obtain 3.

R5,R6→

| rest ( 2 ) |
|---|
| linkage | ret. val (bits) |
| s (x4000) |