

Basic parameter usage

```
FRUIT="kiwi"
FRUITS=(oranges apples bananas)
echo "Today we offer $FRUITs. Maybe you like
some ${FRUIT}s? We also have
${FRUITS[*]}."
```

```
Today we offer . Maybe you like some kiwis?
We also have oranges apples bananas.
```

Parameter indirection

```
kiwi=5
fruit="kiwi"
echo "A ${fruit} costs ${!fruit} coins."
```

```
A kiwi costs 5 coins.
```

Case modification

```
boy="john"
girl="mARY"
echo "The boys name is ${boy}, properly written
as ${boy^}. The girl is ${girl,,}, but I prefer
${girl~}."
```

```
The boys name is john, properly written as
John. The girl is mary, but I prefer Mary.
```

Substring removal

```
${VAR#P}    Remove pattern P from start
${VAR%P}    Remove pattern P from end
FILE        text_file.txt
${FILE%.*}  text_file
${FILE##.*} txt
DIR         /a/b/c.txt
${DIR%/*}   /a/b
${DIR##*/}  c.txt
```

When working on arrays, expansion will handle each element separately.

Search and Replace

```
${VAR/P/R}  Replace pattern P with R (1st
occurrence)
```

```
${VAR//P/R} Replace pattern P with R (all
occurrences)
```

```
A          "Dynamos can explode"
```

```
${A/mos/mit} "Dynamite can explode"
e)
```

```
B          "XXX"
```

```
${B/#X/Y}   "YXX"
```

```
${B/%X/Y}   "XXY"
```

String and array length

```
${#PARAM}   length of $PARAM
```

```
${#ARR[1]}  length of 2nd element in $ARR
```

```
${#ARR[@]}  number of elements in $ARR
```

Caution: The number of elements in an array may not reflect its highest index!

Substrings

```
T          A day without sunshine is like,
you know, night.
```

```
${T:OFS}   OFS is the position to start
```

```
${T:32}    you know, night.
```

```
${T:(-6)}  night.
```

```
${T:OFS:L} L is an optional length
```

```
${T:14:9}  sunshine
```

```
${T:(-6):5} night
```

```
ARR        (This is a text)
```

```
${ARR[0]:2} is
2)
```

```
${array[@]:} is a
1:2)
```

Default values



By **Jens Preußner** (Jenzopr)
cheatography.com/jenzopr/

Not published yet.
Last updated 28th July, 2014.
Page 1 of 1.

Sponsored by **Readability-Score.com**
Measure your website readability!
<https://readability-score.com>