
Subject: Max number of elements in an array
Posted by [Jean H.](#) on Tue, 08 May 2007 21:34:55 GMT
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Hi all,

I can't remember this... what is the type of the variable used to index an array? ... in other words, what is the max number of elements an array can hold, provided the memory is available? Is there a way to change that, so I can use, let's say, an unsigned long 64?

Thanks,

Jean

Subject: Re: Max number of elements in an array
Posted by [Paolo Grigis](#) on Mon, 14 May 2007 12:48:46 GMT
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Jean H. wrote:

> Hi all,
>
> I can't remember this... what is the type of the variable used to index
> an array? ... in other words, what is the max number of elements an
> array can hold, provided the memory is available? Is there a way to
> change that, so I can use, let's say, an unsigned long 64?

In the 32-bits version, signed longs are used.
Thus the max number of elements of a byte array is $(2^{31}-\text{offset})$,
where offset is a small number (around 10).

IDL 64 bit uses signed double precision longs, and the max number of elements in a byte array is $(2^{63}-\text{offset})$ [here the offset seems to be around 512].

For other numeric types, divide the above numbers by the size in bytes of one element.

Ciao,
Paolo

>
> Thanks,
>
> Jean

Subject: Re: Max number of elements in an array
Posted by [Jean H.](#) on Mon, 14 May 2007 16:18:07 GMT
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> to be around 512].
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> For other numeric types, divide the above numbers by the size in
> bytes of one element.
>
> Ciao,
> Paolo

Thanks Paolo! Exactly what I was looking for!

Jean
