
Subject: Re: vector of bin indices using histogram?
Posted by [Foldy Lajos](#) on Wed, 18 Oct 2006 16:25:13 GMT
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On Wed, 18 Oct 2006, David Fanning wrote:

```
> =?ISO-8859-2?Q?F=D6LDY_Lajos?= writes:
>
>> oops, I have to correct myself: FDIV latency is 23 clock cycles for float,
>> 38 for double, and 43 for long double. Anyway, it is greater than 7.
>
> Well, the multiplication is actually a bit faster on
> my machine (Windows) than the division. So I'm not
> at all sure how generalized this result is.
>
> Cheers,
> David
```

A little experiment with a surprising result, on a Pentium D 3.4 GHz with linux and IDL 6.2. The array size is small to avoid memory access latency.

regards,
lajos

```
; md.pro <- cut here
a=sin(findgen(1000))*1e38
nrep=1000000
```

```
t=systime(1)
for j=1l,nrep do b=a/2.
print, 'DIV: ', systime(1)-t
```

```
t=systime(1)
for j=1l,nrep do b=a*0.5
print, 'MUL: ', systime(1)-t
```

```
end
; md.pro <- cut here
```

```
IDL> .ru md
% Compiled module: $MAIN$.
DIV:    13.824564
MUL:    2.1084599
IDL> .ru md
% Compiled module: $MAIN$.
DIV:    13.793007
```

MUL: 2.0625601
IDL> .ru md
% Compiled module: \$MAIN\$.
DIV: 13.829693
MUL: 2.1155751
IDL>
