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Subject: Re: vector of bin indices using histogram?  
Posted by [Foldy Lajos](#) on Wed, 18 Oct 2006 15:33:11 GMT  
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On Wed, 18 Oct 2006, David Fanning wrote:

```
> Paolo Grigis writes:
>
>> You might also want to change the computation of b with
>> a division into a multiplication by the reciprocal (see
>> example below).
>>
>> x=fltarr(5d7)
>>
>> t=systime(/seconds)
>> y=x/2.
>> print,systime(/seconds)-t
>>      0.82191920
>>
>> t=systime(/seconds)
>> y=x*(1./2)
>> print,systime(/seconds)-t
>>      0.33465910
>
> Well, that's interesting. Do you have a theory about this? :-)
>
```

CPU latency. Eg. for Pentium 4, the latency is 7 clock cycles for FMUL, and 43 for FDIV (this is worst case, depends on the data, and assumes that the data is in the L1 cache). Decent compilers (including FL :-) replace division by float const by multiplication.

regards,  
lajos

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