Subject: Re: IDLtoAVIGENERATOR gives unexpected output when dimension is not power of 2?
Posted by Haje Korth on Mon, 08 Jan 2007 13:28:16 GMT
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The issues yar are having are codec related. Some codec have limitations on the allowed image dimensions (divisible by 2, 4, etc.). idl2avi makes no efforts in checking whether your input meets theese requirements. Supplying wrong input can give you anything from funky results to total crashes. I use VP3 codec for a lot of my movies and I usually pad the images to meet the size requirements.

Good luck,
Haje

"biophys" <biophys@gmail.com> wrote in message
news:1168203313.137281.91000@42g2000cwt.googlegroups.com...
> Hello,
>
> I've been using idl2avi.dlm and lately the new IDLtoAVIGENERATOR.dlm
> quite a few times and it all gives me satisfactory results. Recently I
> need to make avi output under windows with some random size, say
> 258x349, not 128x128,256x256 as usual. The program runs smoothly and
> generates avi output. However, when I open avi with windows media
> player, the frames are like skewed by 30 to 60 degrees and sometimes
> the color is also screwed up. When I force the program to feed 256x256
> images, it works fine. It seems to be codec independent and
> reproducible in different machines. Also it does not matter if it is
> generated with 8bits or 24 bits. My guess in the title may not be
> completely true since I did not try all possible combinations of
> dimensions. The example testAVIgenerator works with its default size
> 300x400, but not some other size 258x349. But strangely 300x400 does
> not work in my program. I also had good luck with size of 512x[some
> random dimension smaller than 512] or [some random dimension smaller
> than 512]x512. I am totally lost here. Am I the only one who has this
> problem? Can someone help me understand this?
>
> Many thanks!
> BP
>

Subject: Re: IDLtoAVIGENERATOR gives unexpected output when dimension is not power of 2?
Posted by Rick Towler on Mon, 08 Jan 2007 17:39:36 GMT
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The issue is most likely related to the fact that your frame sizes
aren't evenly divisible by 4, 8, or 16. To be safe, your frame sizes
should be divisible by 8 and some codecs are optimized for 16. I am
stumped as to why the demo 300x400 works but your code doesn't. I
suspect that you used different codecs between the test and your code.
I'll guess the test was done with the cinepack codec?

Stick with "legal" frame sizes and you should have better luck.

-Rick

biophys wrote:
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Subject: Re: IDLtoAVIGENERATOR gives unexpected output when dimension is
not power of 2?
Posted by biophys on Tue, 09 Jan 2007 08:36:21 GMT
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Haje and Rick,

Thanks for the replys. It's good to know that the size has to be
divisible by 4,8,16. For the codecs listed in IDLtoAVIGENERATOR.dlm, I
was testing mostly with fullframe(uncompressed) and cinepack. I googled
and found out that cinpack compressed with 4x4 data chunks. All size

that can be divisible by 4 works perfectly with fullframe and cinepack
as well as microsoft video 1. I still have no luck with other codecs
listed there. Maybe that's not very important since cinepack seems to
give reasonable balance between size and quality. I am used to use flc
format under unix/linux and sometimes convert them into divx. I am
curious about what do you guys use today for scientific animations? How
do you add codecs to this dlm. Is the source of IDLtoAVI generally
available? Flash would be great if there is an easy and free
implementation. Unfortunately it is not free.

BP

Rick Towler wrote:
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> -Rick
>

Subject: Re: IDLtoAVIGENERATOR gives unexpected output when dimension is not power of 2?
Posted by Haje Korth on Tue, 09 Jan 2007 18:07:56 GMT
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Hi,
the dlm grabs the list of video for windows codecs from the OS (don't use
any quicktime codecs, they won't work). When you install the codec it
contains the routine that registers the codec with the OS for futher use.
You can get links to codecs and info here: http://www.fourcc.org/. Also
Reimar Bauer answered a post to me a while ago about using Flash. There seem
to be some free options out there. Just google the newsgroups.

Haje

"biophys" <biophys@gmail.com> wrote in message
 news:1168331781.447772.116590@v33g2000cwv.googlegroups.com.. .
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Subject: Re: IDLtoAVIGENERATOR gives unexpected output when dimension is not power of 2?
Posted by badjelly.witch on Wed, 10 Jan 2007 23:17:53 GMT
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Where can I get IDLtoAVIGENERATOR?

I'm just curious. I'm using Oleg Kornilov's avi.dll at the moment, with
a wrapper function that stops me from crashing IDL by passing bad data.
But I may go back to a DLM version in future so I want to keep an eye
on these things.