



author Denis Arefev <arefev@swemel.ru> 2025-03-21 13:52:31 +0300
committer Greg Kroah-Hartman <gregkh@linuxfoundation.org> 2025-05-02 07:44:15 +0200
commit [f2904fa2b9da943db6bef7c0f8b3fb4fc14acbc4](#) (patch)
tree [2a860e17960cecd5248aeb3de0630bc1dd912c9](#)
parent [be0fffc4152aac4f0291ed2d793f3cf788449d](#) (diff)
download [linux-f2904fa2b9da943db6bef7c0f8b3fb4fc14acbc4.tar.gz](#)

diff options

context: 3
space: include
mode: unified

drm/amd/pm/swsmu/smu13/smu_v13_0: Prevent division by zero

commit f23e9116ebb71b63fe9cec0dcac792aa9af30b0c upstream.

The user can set any speed value.

If speed is greater than `UINT_MAX/8`, division by zero is possible.

Found by Linux Verification Center ([linuxtesting.org](#)) with SVACE.

Fixes: c05d1c401572 ("drm/amd/swsmu: add aldebaran smu13 ip support (v3)")
Signed-off-by: Denis Arefev <arefev@swemel.ru>
Signed-off-by: Alex Deucher <alexander.deucher@amd.com>
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Diffstat

-rw-r--r-- drivers/gpu/drm/amd/pm/swsmu/smu13/smu_v13_0.c 2

1 files changed, 1 insertions, 1 deletions

```
diff --git a/drivers/gpu/drm/amd/pm/swsmu/smu13/smu_v13_0.c b/drivers/gpu/drm/amd/pm/swsmu/smu13/smu_v13_0.c
index 7671a8b3c195a2..7524427b044f34 100644
--- a/drivers/gpu/drm/amd/pm/swsmu/smu13/smu_v13_0.c
+++ b/drivers/gpu/drm/amd/pm/swsmu/smu13/smu_v13_0.c
@@ -1154,7 +1154,7 @@ int smu_v13_0_set_fan_speed_rpm(struct smu_context *smu,
     int ret;
     uint32_t tach_period, crystal_clock_freq;

-    if (!speed)
+    if (!speed || speed > UINT_MAX/8)
        return -EINVAL;

    ret = smu_v13_0_auto_fan_control(smu, 0);
```