Tapani   08-07-14, 04:17 PM

Resetting regens

This is in between a discussion post and a blogpost. I am describing something I failed with this weekend, and maybe someone else has a brainfart insight that is helpful.

Problem I (we?) want to solve:

Set regen attributes in a way that after multiple generations the players still look roughly like the originals. No attributes should dilate or get strange/extreme distributions of values.

So we need a regeneration code that pretty much restores the values of a 35-year old retiree to how he looked like when he was 17. Or whichever age the game chooses to give them.

A first step to formalize this problem is:
Given an old player, and a target age, reset the attributes so that the player has about the same attribute values as the old player had when he was at target age.
So given a 37 year old dude, and the age 21 -- make him look the way he did when he was 21. That way his attributes will be roughly unchanged when he regenerates next time.

So I needed data. Maybe there are some easy patterns..?

Data

By holidaying (and inserting a clever bit of code inside cm) I collected 10500+ regeneration events.

So I had data of how a player really looked when he was 17 and how his attributes were at regeneration time.

Now I needed to construct a function that calculated the look of the 17 year old from the attributes of the 35 year old.
So I could use the player at a young age as a "target", from the attributes of the old player.

Bad news: some attributes have gone up during the career. Some have gone down for some players. For the same attribute.
Could be like: 60% has no change, some gained 7 points, some lost 30 points (talking the raw data, not after applying CA on them).

Mining for patterns

There are statistical methods to try to infer patterns in data. So that is the only weapon I have trying to figure out when to increase an attribute, and when to decrease.
Maybe there are patterns regarding player positions, reputations, PA, and age of rebirth and the age of the newborn?

So I applied a decision tree generator (C5.0) to some of the attributes, it generating humongous trees of if-statements (1000s) and still failing to do meaningful predicition. (I chose decision trees since ultimately I have to code the predictor in assembler, and I do not want to attempt hacking neural networks or support vector machines in asm).

So I am kinda stuck here.

The problem is still open: how to reset a regen?

If anyone wants my dataset, I can share.

Craig Forrest   08-07-14, 07:03 PM

If I understand the way regens currently work, Player X (160 PA) retires and Regen X appears, usually sharing the same nationality and always sharing the PA, position, and a few key attributes....

Shouldn't the idea of reconfiguring the regens not be limited to simply trying to replicate Player X at a younger age, but to ensuring that Regen X isn't some 160 PA attacker with low attributes in his crucial attacking skills and high attributes in meaningless skills related to say a goalie?

I don't think it's necessary to make sure that the regens are essentially clones of their original players because then you run into the problem of trying to write code that will basically rewind a player to a younger age with the same distribution of attributes.... instead, would it be easier to create a function whereby players get their attributes distributed roughly based on the key attributes of their position?

I don't really want Ryan Giggs clone every 20 years.... but having a good left-sided Welsh midfielder with would be great... maybe he's not a s fast as Giggs but his passing and creativity are better (for example)... especially if his work rate and determination weren't suddenly 1s and 2s like I've noticed happens far too often

I hope what I wrote makes sense :D

Craig Forrest   08-07-14, 07:06 PM

Just saw this in ArchibaldUK's thread

Quote:

that's what I was referring to since my post may not have been super clear :ok:

---

faz44

08-07-14, 07:25 PM

Quote:

This makes sense to me. I think perfect regens of players wouldn't be any better, I would want CM to produce sensical regens. I don't want certain attributes to virtually disappear if you've played the game to 2035, as currently happens in the game. I personally would say you're overthinking this Tapani but I know you're a perfectionist and you want things to be perfect. However, the game is meant to allow players to grow and develop and a more realistic game wouldn't produce a brand new Alan Shearer when he retires. It's not like that happened in real life. However, for a player to appear that is more-logically created than the current algorithms produce, that for me would be the golden ticket.

Topofthekop

08-07-14, 07:59 PM

For me, If it was possible to have it set so that regens didnt come back with atts like determination, work rate, teamwork, stamina and the hidden stat Natural fitness all with low values like 1, then I wouldnt care about the other stuff..

I find it annoying to spot a regen with great looking stats and then notice he has work rate 1, determination 1 and poor stamina so that he is constantly having to be subbed off...

I dunno if its possible, but is it possible to get a retired player to regen under a totally random nationality or position so that it would be even harder to find the great players?

---

milo

08-07-14, 08:13 PM

Quote:

this means you could have 5-10 top players from vanuatu in 2027 and that they can win 2034 WC, i don't think that's very realistic honestly

---

Topofthekop

08-07-14, 08:15 PM

Quote:

But is it realistic having players come back with 1 pace, 1 determination or work rate etc?

I was just thinking of this option as being more along the lines of real world. When Messi retires they arent going to get a regen of him come through now are they? Yes I know its just a game, but it would also add a sense of realism that your not gonna constantly have a "New Messi" every 15 years or so! :)

---

milo

08-07-14, 08:28 PM

Quote:

no, but i agree with you, i don't even like the idea of clone regens, i was just saying i like even less the idea of random nationality for players (included superstars of course).

in my opinion it would be nice to have the regen of messi (keeping his CA or something around that) with random attributes and same nationality rather than the regen of messi with same attributes and random nationality.

assuming that the ''1's for some attributes'' problem should be solved if possible :ok:

Topofthekop

Would be better if they were "Newgens".. Would add slightly more realism to the game, while at the same time also making it harder to spot the "Potential Stars" :D

---

archibalduk

Having only gotten back into CM recently, I'm not all that sure how the regen system works. However, my experience of EHM regens (EHM being based on CM4) is that it's undesirable for regens to be carbon copies of their retired counterparts. The game becomes hunt the regen with users typically hunting out the Ronaldo regen (well, the hockey equivalent) because you can be guaranteed success. Ideally I think a role-based system would be better. I'd visualise it as a bar chart of attributes with different weightings according to the player's role and CA (as Craig quoted me above). I've no idea whether that's a feasible suggestion - but then I'd never have imagined you'd be able to programme anything into the game at all - it's pretty incredible!

Craig Forrest

Quote:

> Originally Posted by **archibalduk** »
> The game becomes hunt the regen with users typically hunting out the Ronaldo regen (well, the hockey equivalent)

Giroux? :D

---

archibalduk

Quote:

> Originally Posted by **Craig Forrest** »
> Giroux? :D

Nah, he's too busy grabbing male police officers' asses. :D

Btw, 4-0 Germany! Wtf! :shocked:

Craig Forrest

Quote:

> Originally Posted by **archibalduk** »
> Nah, he's too busy grabbing male police officers' asses. :D
>
> Btw, 4-0 Germany! Wtf! :shocked:

In ottawa too.... I actually saw him in the back of a cop car when I was downtown with my kids and though "Holy crap that guy looks like Claude Giroux" :D

Tapani

Let's try to un-dereail the thread (forget my comment about having a dev area so threads won't get derailed... guess devs are just as able to create a trainwreck as everyone else :)).

Replacing regens with newgens is much easier. Would be quite fun to code actually.

However I would expect an outcry if I did that -- and my philosophy with patches is (usually) to "improve but not change". Just because I can make the game different, I need to be careful if I should. In general, way to few programmers think that way -- they change just because they can.

Topofthekop

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> Originally Posted by **Tapani** »
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Would it not be as simple as to include the option to tick if the person playing wishes to have "Newgens" instead of "Regens", Much like you included the option to use a bigger Interface etc?

Or is it more complex than that?

We as players of this Iconic game appreciate all you have done, and all you are continuing to do so to keep this game alive. Thanks Tapani, you indeed are a LEGEND!

Tapani

22-07-14, 05:24 PM

Generally I try to avoid too many "checkboxes".
It makes the patcher more complex, I need to track more features ... and quite often fixes are dependent on other fixes.

Also, my philosophy has been to keep the game as one unit as much as possible, if every feature is customizable we no longer have one game but everyones own version. And there soon is no common ground on to build a community.

Anyway: I have an idea on how to easily generate newgens, also optimistic on the kind of newgens generated. However, I am afraid people will not appreciate them -- they *want* Messi's regen.

Ratio

22-07-14, 05:34 PM

Quote:
> *Originally Posted by **Tapani***
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>
> *Anyway: I have an idea on how to easily generate newgens, also optimistic on the kind of newgens generated. However, I am afraid people will not appreciate them -- they *want* Messi's regen.*

I agree with you, although I'm not so glad finding another "all 20's" boosted player like Messi..not so realistic..if someone watched him playing in Brazil.....

Zé

22-07-14, 07:03 PM

Quote:
> *Originally Posted by **Tapani***
> *Anyway: I have an idea on how to easily generate newgens, also optimistic on the kind of newgens generated. However, I am afraid people will not appreciate them -- they *want* Messi's regen.*

I understand your point. But I for one would appreciate it :ok: That might be because I pay no attention to who a regen was in a prior life.

Jesus

22-07-14, 08:10 PM

Quote:
> *Originally Posted by **Tapani***
> *Anyway: I have an idea on how to easily generate newgens, also optimistic on the kind of newgens generated. However, I am afraid people will not appreciate them -- they *want* Messi's regen.*

They might *want* Messi's regen but he's pretty useless if he has 1 for work rate and determination. Personally I would love to see newgens instead of regens, I think Craig Forrest hit the nail on the head that it would be refreshing to get a regen/newgen that is similar but not identical.

Topofthekop

22-07-14, 08:12 PM

Newgens would be super duper awesome and actually make me want to play the game again!!!

Bring it on home Maestro! :hail::cool:

Cam F

22-07-14, 08:30 PM

As someone who doesn't use cmscout or anything like that I think it is cool.I only find players by my scout or looking at u21 teams or random clubs.

Zé

> Quote:
>
> > *Originally Posted by **Cam F***
> >
> > *As someone who doesn't use cmscout or anything like that I think it is cool.I only find players by my scout or looking at u21 teams or random clubs.*

+1

Ratio

> Quote:
>
> > *Originally Posted by **Zé***
> >
> > *+1*

+2

Fods

> Quote:
>
> > *Originally Posted by **Cam F***
> >
> > *As someone who doesn't use cmscout or anything like that I think it is cool.I only find players by my scout or looking at u21 teams or random clubs.*

> Quote:
>
> > *Originally Posted by **Zé***
> >
> > *+1*

> Quote:
>
> > *Originally Posted by **Ratio***
> >
> > *+2*

-1

I had a game recently where I found a newgen at the start of the game, he looked piss (but I do use CM Scout) and saw he had decent reps and PA, I bought him and now he is a world beater. Will post a pic up when home :ok:

Tapani

Appears like most people (posting here) likes newgens instead of regens.

Personally I always disliked regens, but got used to them. When playing online (many moons ago) it often was a chase for, say, who is the first to find and sign Shevschenko's regen.

Fodster, if your dude had "decent reps" ... it was a regen :ok:

Show 40 post(s) from this thread on one page

Resetting regens

Printable View

Fods

23-07-14, 07:25 AM

> Quote:
>
> Originally Posted by **Tapani** »
>
> *Fodster, if your dude had "decent reps" ... it was a regen :ok:*

Not sure he is mate, as soon as I start a new game I run CM SCOUT and GPF2, this guy Paul Harding appeared on a FREE and I snapped him up, as you can see he is not in the editor.

See pics below, there is no physical way he could of regenned between me starting a new game and running CM Scout as I didnt proceed.

http://i60.tinypic.com/10ct3j4.jpg

http://i60.tinypic.com/30jjino.jpg

http://i58.tinypic.com/3tous.jpg

http://i57.tinypic.com/8vxdh2.jpg

Tapani

23-07-14, 07:50 AM

If he is a regen, he wont show up in the database :p
And he certainly looks "man made" :D ... which database?

Newly generated players should have very low reputations, but a regen inherits some reputation from the previus generation.

Fods

23-07-14, 09:45 AM

> Quote:
>
> Originally Posted by **Tapani** »
>
> **If he is a regen, he wont show up in the database** :p
> And he certainly looks "man made" :D ... which database?
>
> *Newly generated players should have very low reputations, but a regen inherits some reputation from the previus generation.*

:D I am aware of that, my point was to prove he was a newgen and not a regen and not an existing player in the DB :)

Latest Update March 2014.

Ok, so if it is a regen... which Welsh Rb with a PA of 192 is it...

Coys

28-11-14, 02:26 AM

Any news on this?

Fods

28-11-14, 02:29 AM

yeh I am right and Tapani was wrong :D

---

saturn

19-02-15, 11:34 AM

The issue of regens and the long-term changes of attribute values (high positioning, low reflexes etc) arose in a different thread recently so I decided to start a long-term game with the intention of charting all the attributes and any resulting changes in them. I decided to pick the Welsh league on .68 as it's the smallest, changing nothing apart from having the speed at x200.

Once I began the game I immediately saved and opened the game in CMScout. From there I searched to see how many players in the game had a value of 15 or more for each attribute and noted the figure down. I did it again in November 2002 to allow for training to kick in and used these

figures as the "base" value to compare against future figures. Perhaps I should've used the immediate July 2001 figures but they're both there anyway.

Here's the table:

Spoiler! Show

Attributes with an asterisk next to it indicate that they are a mental attribute. These are less accurate as CMScout only searches for players' attributes, not staff attributes. So there could for instance be a total of 600 players/staff with 15+ for Adaptability at the start of the game, not 555. But generally you can still observe any trends for mental attributes, such as the decimation of Ambition.

I let the save game run even further than the 100 years I had initially planned for as I was curious about a couple of things, so here's a table that shows the attributes at 2213 and 2429:

Spoiler! Show

From just playing the game, I was surprised that a couple of attributes didn't fall as much as I thought they would, namely Jumping and Pace. Pace is strange in how it plateaus after the first generation of players retire (could be explained by the first year of training?), as is Natural Fitness.

The less heralded rise of Anticipation, Handling and One On Ones could further explain (alongside the rise of Positioning) the lack of goals in the future. Technique falling probably doesn't help either, but perhaps it affects both defense and attack.

Consistency rising hopefully won't have much of an affect as I remember one of the update team mentioning that it doesn't seem to do anything from their tests with it.

The other two big risers are at the bottom with Throw-Ins and Versatility. I don't mind Versatility rising as players having slightly different stats in the future could necessitate the need for retraining. As for Throw-Ins, I guess the only damage its rise could do is take points off other stats in compensation when regens are made (does it even work like that?).

Hopefully the figures here will be of some use to Tapani or anyone looking to try and alter the regen code.

Tapani

Thank you Saturn,

too bad the issue is deeper than it first seems. To do regens/newgens right, we should try to preserve the shape of the distribution curve for each attribute. That is to have about the same percentage of the players having, say, 9 in Decision. Dumping my data below:

Spoiler! Show

After each attribute there are some numbers, like:
2003 : X Y
2071 : X Y
rms Z

The X stands for the average of the attribute in years 2003 and 2071 respectively (68 years is about 4 regeneration cycles).
The Y stands for standard deviation of the attribute.
The Z is the *root mean square* of the distribution of the values before and after. The larger the number, the bigger of a problem we have with that attribute.

Then there are two "figures". The left is the value distribution in 2003, the right one is the value distribution in 2071.

Sorting the attributes by RMS (high value means 2071 values deviate more from the 2003 distribution, low values less deviation). A 0.000000 rms means values are unchanged by both regeneration and a playing career.

Spoiler! Show

The problem is not to preserve the average, it is the higher moments (shape of the distribution) that makes it really difficult.

For regens I have data of some 10,000 players -- how they looked freshly (re)generated and how they looked like just before retiring.
I can dump some if anyone is interested. (It is very random, some values go up, some go down, in seemingly unpredictable ways).

---

saturn

Excellent data, I was hoping someone had done something like this as it's a lot more precise. For instance Creativity didn't seem to be an issue from my testing but that was only due to my slightly arbitrary choice of checking for values of 15+, thus missing the impact below that number.

There seems to be only seven significantly troublesome attributes: Anticipation; Creativity; Decisions; Influence; Positioning; Reflexes and Technique. Adding in some Hidden Attributes from my testing we can bring this up to eleven by including Ambition, Consistency, Throw-Ins and Versatitility. They seem to be split 50/50 in terms of stats that are affected by CA and those that aren't, so no help there. From a gameplay perspective it really could have been a lot worse in terms of the stats affected. Positioning is the obvious one but the others don't seem *too* bad, although Creativity can become quite powerful in the future for low CA players. The game could have become nigh on unplayable if the fall in Ambition had hit Professionalism instead for example.

Could you post the data you have regarding players before and after they retire? I'm still trying to find a thread where somebody noticed a big jump in intrinsic values in certain attributes for some players before they reached retirement (as in a full year or two before they retired - I stumbled upon an anecdotal example here). As you can see our old friend Positioning is still climbing: I was wondering whether this late stealth surge was the reason for regens coming back with higher values than expected. I'll try and find that thread later today.

That above paragraph only applies to one stat which leads me to asking: how are you approaching the regen code? Or rather, how is the regen code generally written? Would it require you to rewrite one large piece that affects every attribute or can you break it up one attribute at a time? I'd imagine that the latter would be much easier!

Tapani

The regen code is many function calls, resetting many things I do not understand. Will add my own code to the end, redoing it my way.

The player data is on my linux partition. Will post it tomorrow when I reboot to linux so I can analyse the run I am leaving overnight.
The first attempt at newgens is being run! :-)

---

greg

I think if the computer teams had a default GK training of (M,M,N,M,M) instead of (L,L,N,L,I), that would help with the increasing POS and decreasing REF.

JohnLocke

Quote:

> Originally Posted by **Tapani** »
> The regen code is many function calls, resetting many things I do not understand.

I'd like to take a look, can you post the offsets?

I've found the main retirement/regen code (7AACE0 onwards) - thanks to some notes you posted on the forum a few years ago.

You might find this link helpful: https://hugo9cf.wordpress.com/resour...9cf-page/#olly (although you might have already figured such things out yourself)

Tapani

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>
> You might find this link helpful: https://hugo9cf.wordpress.com/resour...9cf-page/#olly (although you might have already figured such things out yourself)

Regeneration functions:
7abac0
538ec0
(there are more.)

Yes, I pretty much had what your 9cf page had. You had some fields in the clubFinances struct I had not identified. Might come handy now when I am looking at economy.

Tapani

Quote:

> Originally Posted by **saturn** »
> Could you post the data you have regarding players before and after they retire? I'm still trying to find a thread where somebody noticed a big jump in intrinsic values in certain attributes for some players before they reached retirement (as in a full year or two before they retired - I stumbled upon an anectodal example here). As you can see our old friend Positioning is still climbing: I was wondering whether this late stealth surge was the reason for regens coming back with higher values than expected. I'll try and find that thread later today.

My dataset is now at http://tapani.homeftp.org/cm/dataset3.zip (it's 60MB compressed, over 200MB uncompressed).
Inside you have the raw data, a log of every player for every year (so it is possible to track the changes in attributes year by year), and a player folder.
In the player folder, every player ever seen has a file with two lines of data (files are named after the player identifier). The first line in the player file is how the player looked like when he was first seen (as a new regen). The second line is the last time he was seen (before retiring). So comparing the lifetime changes in attributes is easy-ish.

The data format is line based, and as follows:
Example
Code:

```
2030 192b:2023 D 33 123/155  3136  1575  3033 12  6 14 13 15 16 17  3  7 10 10  6 12 12  7 19 13  1 14  7  6  6  5
6  9 16 16  8  9 17 14 [  +0 +14 +17  +9 -46 +16 +16 +14  +6 -68 -84 +11 -67 -57 +14 +17 -125  -8
+11  +1  +7 +19 +19 -18 -13 -68 +13 -17 +10 -28  -3 -57 -53 +20 +16 +15  -8 +14  +6 -13 +11 -40 ]
```

One player/year is one line, and data fields on each line are separated by whitespace:
Code:

```
Year person_identifier:player_identifier rough_position age CA/PA reputation1 reputation2 reputation3
visible_attribute31 ... visible_attribute1 [ raw_attribute1 ... raw_attribute42 ]
```

So the example player above is a player from 2030, a defender, age 33, CA=123, PA=155, acceleration=14, ... , work rate=12 etc

Tapani

First shot at newgens:

Screens:

Randomly picked players in various leagues.
Looking okayish, but there seems to be a problem with Influence and Strength.

One of the 1st team defenders in Burnley, a D1 side in 2090.

Spoiler! Show

Crystal palace is one of the top teams in English Premier. One of their defenders.

Spoiler! Show

Cogenhoe are newcomers in the season 2090 to Conference North (after a brief visit in 2058/59 season)

Spoiler! Show

Osasuna's main striker -- Osasuna is an upper half team in Spanish 1st division.

Spoiler! Show

One of the highest valued goalkeepers in the game. In 2090, West ham is one of the top teams in English PRM.

Spoiler! Show

Everton's star midfielder. Everton is a low-mid table team in English PRM.

Spoiler! Show

One of Chelsea's 1st team players. Chelsea is upper mid-table team in Eng PRM.

Spoiler! Show

Statistics:

Spoiler! Show

And the RMS values are better than the ones we have for regens

Spoiler! Show

Influence has goon completely whack though. Why, I cannot say, it is generated the same way as all the other attributes.
Having some ideas why some of the physical attributes are being a bit off.

Tweaking ahead...

saturn

That looks incredibley promising Tapani, great work! Even from that first run the attributes with high RMS values are (seemingly) way less significant from a gameplaying perspective than those from the original coding. I like the way that the previously 'locked' stats of Balance, Bravery etc also change - they really will be newgens!

Regarding the dataset you shared, the players_set3 folder seems to be empty.

Also, JohnLocke posted an offset a while ago that seemed to have flown under the radar here. Changing the offset like he described resulted in younger regens, ie no more 25/26 year old regens. Regens sometimes coming back as a different nationality still occured, which I found to be a plus as it kept things slightly random.

JohnLocke

Quote:

*Originally Posted by **saturn** »*

Also, JohnLocke posted an offset a while ago that seemed to have flown under the radar here. Changing the offset like he described

resulted in younger regens, ie no more 25/26 year old regens. Regens sometimes coming back as a different nationality still occured, which I found to be a plus as it kept things slightly random.

I suspect Tapani knows about that... as it was based on something I found in some of his notes.

BobMem

That Burnley defender's positioning looks a bit low! :lol:

Seriously this is amazing stuff. If you manage to crack this it will literally be a game changer. :hail:

Best of luck.

Tapani

Thanks guys :-)

Saturn, uploading a new version of the data set tomorrow then.

Status update:

Been spending most of the day figuring out why influence (and others) increase the way they do.

Anyone (JL?) care to take a look and see if you can figure it out?

The increase happens at 5d5078. The increase is dependent, in a semi-random way, on a magic number stored at [esp+5c]. This magic number is calculated in the function call at 5ce4bc, where the game mixes togehther ambition, loyalty and the players index number (!). I do not understand at all.
That function where all that happens is also very large, making it very hard to overview. It's one of the larger ones I have seen inside CM... about 32kB compiled.

Speculating that it is some sort of player maturing function, it seems to influence many attributes likely to change when a player gets older.

Based on this speculation, I tried to tweak the newgen function -- to pick the age dependent attributes from players aged 18 or younger. But this just increased the rate of deterioration...

Kinda stuck now.

JohnLocke

Quote:

> Originally Posted by **Tapani** »
>
> *The increase happens at 5d5078. The increase is dependent, in a semi-random way, on a magic number stored at [esp+5c].*

Is this the same same ESP+5C as @ 5CE80C?

If so, does the code below indicate that the value in ESP+5C (& then in EAX) is a person? In which case, could the code be looking for a (retired) person to attach the new player to?

```
005CE80C > \8B4424 5C MOV EAX,DWORD PTR SS:[ESP+5C] ;
005CE810 . 85C0 TEST EAX,EAX
005CE812 . 74 7C JE SHORT 005CE890
005CE814 . 85F6 TEST ESI,ESI
005CE816 . 74 20 JE SHORT 005CE838
005CE818 . F746 45 20000 TEST DWORD PTR DS:[ESI+45],00020020
005CE81F . 74 17 JE SHORT 005CE838
005CE821 . 8B40 1A MOV EAX,DWORD PTR DS:[EAX+1A] ; person.nationality
005CE824 . 8B4D 1A MOV ECX,DWORD PTR SS:[EBP+1A] ; person.nationality
005CE827 . 3BC1 CMP EAX,ECX
```

LR

Mind-blowing stuff for a code limited person like me :D
I have got to agree with BobMem. If you pull this off, it will turn into a whole new game.
But now it's time to leave the thread and let this space available for your brainstorming ideas. Make us proud, lads :ok:

Tapani

Quote:

> Originally Posted by **JohnLocke** »
>
> *Is this the same same ESP+5C as @ 5CE80C?*
>
> *If so, does the code below indicate that the value in ESP+5C (& then in EAX) is a person? In which case, could the code be looking for a (retired) person to attach the new player to?*
>
> Code:

```
005CE80C  > \8B4424 5C     MOV EAX,DWORD PTR SS:[ESP+5C]              ;
005CE810  .  85C0          TEST EAX,EAX
005CE812  .  74 7C         JE SHORT 005CE890
005CE814  .  85F6          TEST ESI,ESI
005CE816  .  74 20         JE SHORT 005CE838
005CE818  .  F746 45 20000 TEST DWORD PTR DS:[ESI+45],00020020
005CE81F  .  74 17         JE SHORT 005CE838
005CE821  .  8B40 1A       MOV EAX,DWORD PTR DS:[EAX+1A]              ; person.nationality
005CE824  .  8B4D 1A       MOV ECX,DWORD PTR SS:[EBP+1A]             ; person.nationality
005CE827  .  3BC1          CMP EAX,ECX
```

Different.

Local variables (looking like [ESP+XY]) change index as soon as anything is pushed on the stack (since ESP changes). So ESP+5C can be different variables.
The variable I was tracing is read into EDI at 5d5014, (and was written there at 5ce4d3). It is a small integer, like -10 to 10.

That part of code is not part of regeneration code, but I think a general code run now and then. My hypothesis is that it 'ages' players.

It seems to modify (reduce, due to aging?) physical attributes, modifies anticipation, decisions, influence and consistency (increase, due to experience).
It also seems modify creativity (slightly reduce as well?)

My overnight run brutally just subtracted a random number from influence (up to 5 points) for each regeneration -- that was not enough to keep it in line.
Instead we had almost all players having influence between 15 and 20...

Even the original regen code has problems with influence (and probably with consistency, it is off in the same way).

Tapani

22-02-15, 11:35 AM

> Quote:
>
> Originally Posted by **saturn** »
> *Regarding the dataset you shared, the players_set3 folder seems to be empty.*

No it is not, but the player files are named like "1b30:0a12", and Windows (or zip?) don't like having ':' in filenames. :-(

Re-uploaded it as a tarball, just in case it is ZIP that does not like the filenames.

---

saturn

22-02-15, 12:15 PM

> Quote:
>
> Originally Posted by **Tapani** »
> *No it is not, but the player files are named like "1b30:0a12", and Windows (or zip?) don't like having ':' in filenames. :-(*
>
> *Re-uploaded it as a tarball, just in case it is ZIP that does not like the filenames.*

Thanks, everything unzipped correctly with 7-Zip.

Coys

22-02-15, 01:53 PM

Anybody know which language these guys are speaking? :lol:

BobMem

22-02-15, 04:00 PM

> Quote:
>
> Originally Posted by **Tapani** »
> *That part of code is not part of regeneration code, but I think a general code run now and then. My hypothesis is that it 'ages' players.*
>
> *It seems to modify (reduce, due to aging?) physical attributes, modifies anticipation, decisions, influence and consistency (increase, due to experience).*
> *It also seems modify creativity (slightly reduce as well?)*

I'm sure I've seen players' stats change on their birthday, so it's definitely likely some sort of aging function is called each game day for all players whose birth date = today().

Resetting regens

Printable View

JohnLocke   23-02-15, 08:30 PM

> Quote:
>
> *Originally Posted by **Tapani** ▸▸*
>
> *Thanks guys :-)*
>
> *Saturn, uploading a new version of the data set tomorrow then.*
>
> ***Status update:***
>
> *Been spending most of the day figuring out why influence (and others) increase the way they do.*
>
> *Anyone (JL?) care to take a look and see if you can figure it out?*
>
> *The increase happens at 5d5078. The increase is dependent, in a semi-random way, on a magic number stored at [esp+5c]. This magic number is calculated in the function call at 5ce4bc, where the game mixes togehther ambition, loyalty and the players index number (!). I do not understand at all.*
> *That function where all that happens is also very large, making it very hard to overview. It's one of the larger ones I have seen inside CM... about 32kB compiled.*
>
> *Speculating that it is some sort of player maturing function, it seems to influence many attributes likely to change when a player gets older.*
>
> *Based on this speculation, I tried to tweak the newgen function -- to pick the age dependent attributes from players aged 18 or younger. But this just increased the rate of deterioration...*
>
> *Kinda stuck now.*

I can't even read most that code never mind figure out what it does. I can see all the attributes that are being accessed and then modified but that's about it.

What happens if you remove the increases by filling 5d5078 and similar lines with NOP?

Tapani   24-02-15, 12:37 AM

Thanks for trying. That function was too hard for me as well.

Would like to try avoiding just NOPing stuff out without really understanding what I am doing. Running a test atm where I severly nerf influence values in the newgen process. It seems to be working, we are getting right-ish frequencies of influence values. But, sometimes it seems a bit odd to see a hairy newgen dude with a pile of red 20s staring in my face ... and with a gray 3 in influence.

Tapani   24-02-15, 03:18 PM

Another status update:

Last night, I ran a large 14h session (70 years in 6 leagues with 23k players) - not only looking for attributes being right by themselves. The attributes need to be combined with the right probabilities.
This means there should be the same ratio of good players vs average players throughout time.

Some of my previous tests were done on the same small set of players, and my code has "overfitted" to that data set (tweaking the regen code to reproduce the distribution of that set, and not being as good for the larger data set).

While my distributions starts to look good, I also need to tweak the hidden attributes (esp. consistency is bad; aggression and technique are a (failed) experiment):

Spoiler! [Show]

The overall drift for different types of players seems to be a movement from good -> mediocre, and bad -> mediocre.

Spoiler! [Show]

Tapani

Rewrote the newgen code from scratch tonight. It had grown to a mess by all the tweaking.
Took around 3-4 hours, 882 bytes and 324 instructions. And .. it **worked on the first attempt**! Meaning: no bugs, no crashes. Just does what's expected!

(for non programmers: it is a mini "hole-in-one" for a programmer when a complex program works on the first test. When doing something like CM modding, even getting 50 bytes right can be hard)

Time to get some zzzz and run an nightly holiday test, to see if the players it generates are acceptable. Wanting to move on to other stuff (finances etc) by now..

Coys

Amazing news!

Dermotron

Jiminy jillikers batman

Goofy

> Quote:
>
> *Originally Posted by **Tapani***
>
> *Rewrote the newgen code from scratch tonight. It had grown to a mess by all the tweaking.*
> *Took around 3-4 hours, 882 bytes and 324 instructions. And .. it **worked on the first attempt**! Meaning: no bugs, no crashes. Just does what's expected!*
>
> *(for non programmers: it is a mini "hole-in-one" for a programmer when a complex program works on the first test. When doing something like CM modding, even getting 50 bytes right can be hard)*
>
> *Time to get some zzzz and run an nightly holiday test, to see if the players it generates are acceptable. Wanting to move on to other stuff (finances etc) by now..*

:hail:

Jesus

:hail:

Fods

:ear:

Mark

Great stuff, Tapani. You're going to really give us all a new lease of life with this game as you've always done with your patches.

milo

> Quote:
>
> *Originally Posted by **Tapani***
> *Rewrote the newgen code from scratch tonight. It had grown to a mess by all the tweaking.*

:clap:

> Quote:
>
> *Originally Posted by **Tapani***
> *Took around 3-4 hours, 882 bytes and 324 instructions.*

:twitch:

> Quote:
>
> *Originally Posted by **Tapani***
> *And .. it **worked on the first attempt**! Meaning: no bugs, no crashes. Just does what's expected!*

:peace:

> Quote:
>> *Originally Posted by **Tapani** »*
>> *(for non programmers: it is a mini "hole-in-one" for a programmer when a complex program works on the first test. When doing something like CM modding, even getting 50 bytes right can be hard)*

:jaw:

> Quote:
>> *Originally Posted by **Tapani** »*
>> *Time to get some zzzz and run an nightly holiday test, to see if the players it generates are acceptable.*

:sleep:

> Quote:
>> *Originally Posted by **Tapani** »*
>> *Wanting to move on to other stuff (finances etc) by now..*

:hail:

Erkifino
<div align="right">25-02-15, 11:44 AM</div>

Golf is it? To the 19th!!!
Well done Tapani!!

---

vernon123
<div align="right">25-02-15, 12:07 PM</div>

All Hail the king!

Jesus
<div align="right">27-02-15, 03:33 PM</div>

Is this feature to run alongside regens or to replace regens with newgens? I think the longevity of games are compromised by the dysfunctional distribution of attributes so I would love it if this was to replace regens.

Tapani
<div align="right">27-02-15, 04:12 PM</div>

> Quote:
>> *Originally Posted by **Mark** »*
>> *Great stuff, Tapani. You're going to really give us all a new lease of life with this game as you've always done with your patches.*

Let's hope so.

At least I feel newgens adds a little excitement to it, suddenly I do not know what monster players are out there. Before, I knew which top players existed and had a hunch whose regen I found (or was looking for).

> Quote:
>> *Originally Posted by **Jesus** »*
>> *Is this feature to run alongside regens or to replace regens with newgens? I think the longevity of games are compromised by the dysfunctional distribution of attributes so I would love it if this was to replace regens.*

Replace. Could not make the regen code good enough. This will be :-)

Actually it is little in-between regens and newgens. When a player retires, a newgen is created to take his place - not otherwise.
Also, to keep some balance between the nations, the newgen keeps the PA from his "parent". (Otherwise all, say Brazilian, stars would disappear and be replaced by random players of random quality).

There is still a slight issue with GK physical attributes, but after I fixed it there will be a public beta (also incorporating some financial changes).
Will be needing lot of feedback on both.

Fods
<div align="right">28-02-15, 02:03 AM</div>

http://stream1.gifsoup.com/webroot/a...s/449410_o.gif

Tapani
<div align="right">02-03-15, 01:05 AM</div>

Status update: I have been busy this weekend with further tweaking the newgens, mostly using the latest October 2014 database.

One of the big headscratchers for the newgen code is/was "how to make it adaptable to the database". Some databases have players with hordes of 20s (like the Oct 2014 one), and some are virtually void of 20s (like the old SIM database). The newgen players should have the same style and flavour as the rest of the database. The attribute values should be distributed roughly the same way as in the database used. Regardless which database it is.

Yesterday, I finally had something I started to feel was acceptable for the Oct 2014 release. So I gave my algorithm the "exam". The SIM database.

It failed. Marginally, but still. Actually it did mostly a good job there as well, but I had some hard-coded (non-adaptive) PA values for the player "quality stabilization mechanism" (a part I have to make it likely to have some good players, and some bad players in the game) that failed hard. The newgen algorithm generates all players the same way, and then slightly boosts players with high PA and nerfs players with low PA. In the SIM database, all players have lowish PAs, so the nerf mechanism overwhelmed the boost. And the player quality went into tailspin, getting worse for each generation of newgens.

This has been taking too much time already... (the results are good though).

JLa

Update team: there is only one DB nowadays, right? So it shouldn't really matter if the tweak doesn't work that well on the old SIM DB, as it has been discontinued anyway..?

Fods

Correct JLa, unless there is a secret update team no one knows about :alien:

Tapani

JLa, Fodster -- the SIM database was a test, intended to be tough on my code. I don't expect anyone to play the SIM database from 2010.

The idea is to write code that can handle as many cases as possible. The database used in a few years might have a different philosophy regarding 20s or 1s. And even with the current DB, selecting Scottish or Northern Irish league gives you different pool of players than selecting, say Spanish, league. The newgen code should be adaptive enough for this, and generate players that are appropriate in all those cases.

Hence the test with the SIM database - to give my code a tough challenge.

Tapani

Update:

finally having something that I would consider good enough for release. Ran into unexpected issues with player positions getting skewed (ended up with a player pool with 40% goalkeepers!).

Turns out that there is no inherent limit on how many goalkeepers an AI club will recruit. So all the bad players who usually stay on free transfer gets regenerated over and over, until they pick goalkeeper as position. Then they stop getting re-created since clubs will hire a goalie with 8 in handling. So a player with low PA gets regenerated over and over, until they come back as a GK.

Fixed that. There is now around 1-2% position skew over 70 years (that is 1000 goalkeepers from the start, still increases to maybe 1018 GKs, but I think that becomes a problem after some 1000 years)

My current attribute errors starts to be acceptable. Wanting to have "double zero" rms (less than 0.01 rms) for each attribute, and an average value that stays within 0.5 from the start values over five generations of players (year 2071). Also I dont want a disproportionate number of very high (20s) or very low values compared to the values around 2003.

My tuning database (Oct 2014):

Spoiler! Show

And my "examination database" (sim db from 2010)

Spoiler! Show

In both databases my rms are < 0.00x for most attributes, and none is very bad.

Next up is upping reputations -- the reputations decline after one generation. Also Determination needs some tweaking, (determination value is not regenerated since it is part of the "person" structuer and not the "player" structure -- and I only create new players structures in my newgen code).

Jesus

Really looking forward to the completion of this :)

---

peadar1987

Any news on how this is going? I'm very exited to see how it turns out!

terminaator

Hello,

The regens thing is actually one of the 2 issues that truly bothers me about this otherwise great game. I want to point out some very important things that I dont think have been mentioned yet. I hope I am not too late with that!

1. Regens of "small nations" (wales is a good example) usually are "born" very old (appr. 25years of age, vs under 20 for "big nations"). This seems to create a situation where small nations seem to get considerably weaker by the time the first generation is retired, since newgens never have the time to train and reach their PA.
To counter this, I see two options:
a) change the age of small-country regens to younger;
b) have the CA closer to PA for older regens.

2. Many players have PA 0, -1 or -2 in the database and the actual value is generated randomly when the game starts. I would rather the "newgens" do NOT have the exact same actual PA as their "parent", but instead a random PA that falls into the SAME CATEGORY as their parents. This is for 2 reasons:
a) small nations would also have a chance to generate a rare "superstar".
b) the quality of players at small nations would otherwise be fully "fixed".

I also wonder what this "newgen" means compared to "regen"?
I understand Tapani is actually going for hybrid, same nationality and PA, but random position and skills? That sounds good, but again can you also guarantee that a small nation will not end up with example 20 goalkeepers and 20 outfeld players? In other words, the balance in player positions must also be retained for very small populations.

Its important for me because being from small nation, I always try to reqruit players from my own nation to my team!:)

Another thing that bothers me about this game is how easy it is to make money.
I think there is one very specific bug that if fixed might help a lot.
Namely, I seem to be selling my tickets twice: once when I sell the season-tickets and then again during the league game.
(I assume this because I seem to be getting same amount of (serious) money from league and cup games with similiar attendance, even if I have sold season tickets for 20 million pounds or smth).
Can this be fixed?

Fods

I think Tapani is well aware of both of the issues you mention above mate, good post though.

Ryan Giggs being the prime example, ive noticed in my long term save almost all regens started regenning 25+, I was having to manually adjust ages in a save game editor, which eventually was probably one of the reasons my game crashed.

All times are GMT +1. The time now is 01:27 PM.

Resetting regens

Printable View

ClayDatsusara

29-06-15, 05:04 AM

Quote:

> Originally Posted by **Fodster** »
>
> Correct JLa, unless there is a secret update team no one knows about :alien:

was totallyaddicted inspired by this or the conspiration is a partnership between you two?

---

terminaator

29-06-15, 09:13 AM

good to know, thanks:)
what about this double-selling tickets though, or am I posting this in a wrong place?

Fods

29-06-15, 12:02 PM

Not sure about that Terminator, maybe ask here:

Questions and Comments that Don't Warrant a Thread

---

peadar1987

14-02-16, 08:06 PM

So... Any developments on this? Or even a dev build I can try out? It looks like Tapani was pretty much there to be honest

---

Jesus

14-02-16, 08:13 PM

Quote:

> Originally Posted by **peadar1987** »
>
> So... Any developments on this? Or even a dev build I can try out? It looks like Tapani was pretty much there to be honest

The latest Tapani patch introduces new regens and newgens.

KL1

02-10-16, 01:05 PM

Bad Regens

So in my game, I've reached the point of expecting regens of famous players to appear. I look for players with the same position and nationality, and obviously with very good attributes even at young age. I managed to find several already but I noticed a big problem with them. They have horrible physical attributes! I'm talking less than 5 in categories like agility, jumping, pace, strength, workrate. Not sure what's the deal but it's so bad when you have Lewandowski with 4 jumping, or Iniesta with 3 workrate, or Messi with 5 pace!

Is this a bug in my game or is it a common issue?

I'm using the April update btw.

---

info0

02-10-16, 02:33 PM

common without using latest tapani patch 2.21.1. I recommend using Saturn modification of said Patch if u want to use realistic transfer windows or proper Serie A.

Link to saturn thread here:

http://champman0102.co.uk/showthread.php?t=8414

KL1

Thanks for the link. It looks overwhelming at first glance, I might need some help with it. I'll post my questions in that thread for visibility.

saturn

I've noticed that alongside Tapani's new regen code, he has made changes that will result in regens being reborn with a lower Current Ability ratings than that of their .68 counterparts:

Code:

```
007AC3F4 FMUL QWORD PTR DS:[968E48] FLOAT 0.6000000000000000 --> 0.4000000000000000  1a Players with a striker
rating of 20
007AC41C FMUL QWORD PTR DS:[968E80] FLOAT 0.3000000000000000 --> 0.1500000000000000  1b Players with a striker
rating of 20
007AC44A FMUL QWORD PTR DS:[968968] FLOAT 0.5000000000000000 --> 0.3000000000000000  2a Players with a goalkeeper
rating of 20
007AC480 FMUL QWORD PTR DS:[968E48] FLOAT 0.6000000000000000 --> 0.3750000000000000  3a Players without a rating of
20 in GK/SW/D/S
007AC4B9 FMUL QWORD PTR DS:[96A5D8] FLOAT 0.5500000000000000 --> 0.3300000000000000  4a Players with a sweeper or
defender rating of 20
007AC4E1 FMUL QWORD PTR DS:[9689E0] FLOAT 0.2500000000000000 --> 0.08333333333333333 2/3/4b
```

THe code changes a regen's CA in two places depending on their player position. I don't fully understand all the code that determines what a regen's CA is, but I'm pretty sure that the lower the FLOAT figure above, the lower the CA. As you can see, Tapani reduced the figures for each position. A basic illustration of the differences can be seen in the images below:

Spoiler! [Show]

The first CMScout image is from a .68 DB with a normal exe, other than it being modded to make regens all come back as free transfers. The average CMScout rating% seems to be around the low/mid-50s, with 14 players coming back with a CA of 100+. The second image is from a .68 DB patched with Tapani 2.22, again with the exe modded to make regens all come back as free transfers. Here the average CMScout rating% seems to be around the mid/high-40s, with seven players coming back with a CA of 100+.

Personally I think the changes should be reverted. My concern is that some high PA players will never get the chance to hit the heights of their predecessors if their initial CA is too low. Take Anthony Sheldon from the second screenshot, a 19 year old English SC with a CA/PA of 40/180. It's unlikely that he'll ever reach that PA from such a low starting point and a relatively high regen age.

On a related note, the age regens seems to be set a bit below the CA code, at 007AC5AF, 007AC634, 007AC697 and 007AC6AC. Again I'm not sure how it works exactly, but I would like to change the regens' initial age slightly, from 15-20 to 15-18/19 preferably. I think changing the following does this, though it's hard to test if the changes have worked:

Code:

```
007AC5AF ADD BL,0F --> 0E
007AC697 ADD BL,15 --> 14
```

Initially I reduced the values at all four addresses by two, but those changes were too much.

What are people's thoughts on this?

Coys

I would want it reverted, i'd also want any changes he ever made to player development speed reverted too.

Dermotron

In the second image Gunter Groth will do well to bridge a 62pt CA/PA gap so for the likes of Luke Ellis and Ben Adams it'll never happen.

xeno

Quote:

> Originally Posted by **saturn** »
>
> *I've noticed that alongside Tapani's new regen code, he has made changes that will result in regens being reborn with a lower Current Ability ratings than that of their .68 counterparts:*
>
> *Code:*
>
> ```
> 007AC3F4 FMUL QWORD PTR DS:[968E48] FLOAT 0.6000000000000000 --> 0.4000000000000000  1a Players with a
> striker rating of 20
> 007AC41C FMUL QWORD PTR DS:[968E80] FLOAT 0.3000000000000000 --> 0.1500000000000000  1b Players with a
> striker rating of 20
> 007AC44A FMUL QWORD PTR DS:[968968] FLOAT 0.5000000000000000 --> 0.3000000000000000  2a Players with a
> goalkeeper rating of 20
> 007AC480 FMUL QWORD PTR DS:[968E48] FLOAT 0.6000000000000000 --> 0.3750000000000000  3a Players without a
> rating of 20 in GK/SW/D/S
> 007AC4B9 FMUL QWORD PTR DS:[96A5D8] FLOAT 0.5500000000000000 --> 0.3300000000000000  4a Players with a
> sweeper or defender rating of 20
> 007AC4E1 FMUL QWORD PTR DS:[9689E0] FLOAT 0.2500000000000000 --> 0.08333333333333333 2/3/4b
> ```
>
> *THe code changes a regen's CA in two places depending on their player position. I don't fully understand all the code that determines what a regen's CA is, but I'm pretty sure that the lower the FLOAT figure above, the lower the CA. As you can see, Tapani reduced the figures for each position.*

Hi Saturn,
How do you calculate these FLOAT figures? Because Original 3.9.68 has some lower and also bigger offset adress values which you indicated above. To understand the effect of above offsets, my suggestion is that you shall use same exe by just changing original values to Tapani values.

Actually, I tried to explain the player quality reduce several times to Tapani and to all about new regen code which was added into 2.21 Tapani patch . Also, Sure supported me in his thread , [2.21 patch] 30 years in the future... But, everybody liked new regen code.
https://champman0102.co.uk/showthrea...493#post308493
https://champman0102.co.uk/showthread.php?t=8841

So, I asked Tapani's offsets about new regen. His answer to me is below:

The easiest way to disable the new regen code is probably to remove the call to the new code.
Without digging too deep into CM, the new call is added by the following snippet in the patcher.
The format is { file_offset, old_byte, new_byte }
Code:
```
/* add a call to the new regen code */
{0x003acfa0, 0x56, 0xe8},
{0x003acfa1, 0xe8, 0x5b},
{0x003acfa2, 0x1a, 0x57},
{0x003acfa3, 0xbc, 0xe5},
{0x003acfa4, 0xd8, 0xff},
{0x003acfa5, 0xff, 0x56},
{0x003acfa6, 0x83, 0xe8},
{0x003acfa7, 0xc4, 0x15},
{0x003acfa8, 0x08, 0xbc},
{0x003acfa9, 0x5e, 0xd8},
{0x003acfaa, 0x83, 0xff},
{0x003acfab, 0xc4, 0x83},
{0x003acfac, 0x08, 0xc4},
{0x003acfad, 0xc2, 0x08},
{0x003acfae, 0x04, 0xeb},
{0x003acfaf, 0x00, 0x04},
{0x003acfb2, 0x5e, 0x88},
{0x003acfb3, 0x88, 0x01},
{0x003acfb4, 0x01, 0x5e},
```

To increase the quality of some top regens, you can also try tweaking two constants in the regen function:
6029c7 PUSH 19 <-- the smaller value pushed, the better player with PA over around 150 will be. Try maybe 0c
6029e5 PUSH 5 <-- the smaller value here , the better the top players (PA over around 180) will be. Maybe try 4. (Or just test with something like 2 to see the effects)

Beware that regen code is very sensitive to small changes, if every generation is even slightly better than the one before, all players will be really good in a few generations. And the other way around.

Sure
27-08-18, 06:38 PM

If I remember well, part of Tapani's reasoning was to make particular regens (those Messis, Shevchenkos, Ronaldos and others bipedal 20s alike) harder to find by lowering their attributes when they reenter the market. As we can see, he succeded almost wholly for the purpose of it.

I took time to read my poor prose once again and came to the same conclusion. In my humble opinion, the greatest grief of the actual system (when it comes to regens) comes more from the way they are trained than the way they are reseted. Let's assume the AI trains every players (except goalies, as mentionned in the post xeno linked above) under the general regime. They will gain attributes at random. So if they look bad at regen stage, it's likely they'll look poor/average even after gaining something like 100 CA, cause their attributes won't fit with their position on the field. Of course, a human will adjust the training regimes for his squad, but even in this case you can't really focus on a particular attribute for a particular player (I saw much too often my defenders becoming free kick specialists instead of tackling gurus when I ordered them to raise their skill abilities with the related training routine).

I don't think pre-Tapani regens were doing better, neither I think the aim of the game is to judge our virtual slaves only by looking at their PA/CA instead of their actual ratings and... well, their "obviously made for his given position" attributes. I know it's an important aspect of the CM and it's vital to ensure the balance between stars/good/average/mediocre/horrible number of players as the years are passing in our saves. But at the same time, it's clear that having to chose between Taribo West's regen with a nasty 4 in jumping and the usual unknown defender with a 16-20 at the same place, I will always go for the second (and another problem is that the AI is too focalised on CA/PA, but that's not the point here). I don't give a damn if a potential star cannot reach his max CA as there are hundred of players around to chose for (and physically more able) and I like having to search for someone looking/performing really good (and maybe doing a mistake) rather than playing with my eyes closed assuming my recruit will do exactly the same as his pregen did. So I can't complain about Tapani's work.

Maybe we could help the best players to look much better at "birth", like their "ancestors", but do we really want to buy/train/sell/just play with the same bunch of players again and again ? It's not my case personally, but I'm just giving another opinion :) . Anyway, that's a good debate here.

Dermotron
27-08-18, 08:43 PM

On Xeno's note about going too far one way or then the other, too good would reverse the work to correct high Positioning and low Determination which ruins any game over 8 seasons. The effect would be different but loads of good defenders balance out loads of good attackers. Average defenders, above average attackers

---

saturn
30-08-18, 10:01 PM

Quote:

The values are in the small panel directly beneath the main window of code in Olly. So if you click on the line 007AC3F4, you'll see the value 0.4000000000000000.

> Quote:
>
>
> Actually, I tried to explain the player quality reduce several times to Tapani and to all about new regen code which was added into 2.21 Tapani patch . Also, Sure supported me in his thread , [2.21 patch] 30 years in the future... But, everybody liked new regen code.
> https://champman0102.co.uk/showthrea...493#post308493
> https://champman0102.co.uk/showthread.php?t=8841

Yes I remember that thread, very useful.

> Quote:
>
>
> So, I asked Tapani's offsets about new regen. His answer to me is below:
> <snip>

Interesting, thanks for sharing. It sounds like we have a few methods to potentially try and improve the regens so.

> Quote:
>
>
> If I remember well, part of Tapani's reasoning was to make particular regens (those Messis, Shevchenkos, Ronaldos and others bipedal 20s alike) harder to find by lowering their attributes when they reenter the market. As we can see, he succeded almost wholly for the purpose of it.
>
> I took time to read my poor prose once again and came to the same conclusion. In my humble opinion, the greatest grief of the actual system (when it comes to regens) comes more from the way they are trained than the way they are reseted. Let's assume the AI trains every players (except goalies, as mentionned in the post xeno linked above) under the general regime. They will gain attributes at random. So if they look bad at regen stage, it's likely they'll look poor/average even after gaining something like 100 CA, cause their attributes won't fit with their position on the field. Of course, a human will adjust the training regimes for his squad, but even in this case you can't really focus on a particular attribute for a particular player (I saw much too often my defenders becoming free kick specialists instead of tackling gurus when I ordered them to raise their skill abilities with the related training routine).
>
> I don't think pre-Tapani regens were doing better, neither I think the aim of the game is to judge our virtual slaves only by looking at their PA/CA instead of their actual ratings and... well, their "obviously made for his given position" attributes. I know it's an important aspect of the CM and it's vital to ensure the balance between stars/good/average/mediocre/horrible number of players as the years are passing in our saves. But at the same time, it's clear that having to chose between Taribo West's regen with a nasty 4 in jumping and the usual unknown defender with a 16-20 at the same place, I will always go for the second (and another problem is that the AI is too focalised on CA/PA, but that's not the point here). I don't give a damn if a potential star cannot reach his max CA as there are hundred of players around to chose for (and physically more able) and I like having to search for someone looking/performing really good (and maybe doing a mistake) rather than playing with my eyes closed assuming my recruit will do exactly the same as his pregen did. So I can't complain about Tapani's work.
>
> Maybe we could help the best players to look much better at "birth", like their "ancestors", but do we really want to buy/train/sell/just play with the same bunch of players again and again ? It's not my case personally, but I'm just giving another opinion :) . Anyway, that's a good debate here.

I agree in particular with the underlined part of your post (amongst other things). I know Tapani tracked the overall distribution of attributes amongst regens, but when those attributes are going to players in the wrong positions (defenders with 15+ Finishing) then there's still a problem. Tbh I'm not even sure what the solution would be. As you say, noone wants the CM2 style total regens, though with a new modern database every six months people probably don't get to know players as well as they would the ODB/.68DB.

The second underlined sentence is to me the crux of the regen process. I find the game to be at its most challenging in the first couple of years, when Roma or Man United in .68 still have their superstar teams together. As the game progresses, we (the human managers) are better than the AI at selecting the best/least flawed regens as we know what attributes to look for in each position. If in 2040 there are 50 DCs with 15+ in Heading, Jumping, Positioning & Tackling instead of only 20 of them, then the top AI teams are more likely to pick up a few of them (human managers would probably have at least a couple of them).

Overall I think we can improve the overall regen group which use Tapani's regen process, rather than improve Tapani's regen process itself.

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saturn   29-03-19, 09:57 PM

> Quote:
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>
> To increase the quality of some top regens, you can also try tweaking two constants in the regen function:
> 6029c7 PUSH 19 <-- the smaller value pushed, the better player with PA over around 150 will be. Try maybe 0c
> 6029e5 PUSH 5 <-- the smaller value here , the better the top players (PA over around 180) will be. Maybe try 4. (Or just test with something like 2 to see the effects)
>
> Beware that regen code is very sensitive to small changes, if every generation is even slightly better than the one before, all players will be really good in a few generations. And the other way around.

Xeno (or anyone else), did you try changing the above values and if so, did you find a decent combination that produced better (but not too good) regens? I tried the values 0A and 2 and got some good results. If Tapani's original values created regens that were statistically sound then these crop are what I'd call arcade-regens: fun but maybe not that realistic.

Mercurio   30-03-19, 07:00 PM

> Quote:

I'm a former researcher of Football Manager, and I'd say that two values refer to -1 and -2 PA. Meaning -1 around 150 and -2 around 180 when you start a new game.

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xeno   19-11-19, 01:12 PM

Quote:

I did not try it . Actually, I reversed this regen offsets to original ones in my exe.