

## **Mech Touch 6801**

Chapter 6801: Godbone

The first superdimensional god mech had made its debut.

It was glorious.

Ves and everyone else who was only able to watch the combat footage late became thoroughly impressed by its debut.

"So that is what the mechers have done with much of the high-grade superdimensional matter that they have harvested from the Blue Dimension."

Superdimensional matter was a gamechanger to red humanity. It was the superior version of phasewater in every way.

While phasewater could technically be classified as a superdimensional material as well, the problem was that its liquid composition made it difficult to combine it with modern technology. Its density was also awfully low.

Solid superdimensional matter possessed a lot of traits that made it more useful to red humanity. It exhibited much higher concentrations of the 'superdimensional factor' and did not need to be heavily processed in order to become useful.

If phasewater was useful enough to add to a god mech, then real superdimensional matter was at least an order of magnitude better in many ways!

Out of all of the god mechs that the Red Association chose to integrate much of the initial batch of armor-grade and weapon-grade superdimensional matter, the Invictus was undoubtedly the best choice.

The Auto-Coordinator of the Army of One did not rely on personal combat in order to fight. The god command mech needed way more superdimensional matter in order to upgrade its elaborate collection of automated combat units.

The Geneforger of the Evolution Witch was entirely based on biotechnology and should not readily be able to integrate with superdimensional matter without conducting a lot of research.

The Phoenix of the First Flame was currently missing, but even if it was available, the god mech was so powerful that superdimensional matter would merely be icing on the cake.

The Heartpiercer of the Huntsman was a viable choice. There was a good chance that a fully superdimensional version of the god spearman mech would be able to kill or heavily debilitate ancient phase whale with just a single throw of a superdimensional spear!

However, ever since the Huntsman dedicated more of his time and attention on the Hunting Association, his relationship with the Red Association had clearly cooled.

The two were still on good terms with each other, but it was clear that their relationship had become more complex and not as close to each other anymore.

In that light, if the mechers wanted to empower a god pilot that represented their interests the best, they could never go wrong with boosting the Fist of Defiance first!

From what the Invictus had managed to do in his opening attack, the god pilot more than vindicated this decision!

Despite its obvious lack of bladed weapons, the Invictus was already so damn powerful that it did not need an edge in order to break apart spatial barriers and demolish millions of tons of phase whale flesh.

The application of armor-grade and weapon-grade superdimensional matter onto its transcendent mech frame amplified its existing strengths and made it absurdly more effective against opponents that heavily relied on phasewater.

An important reason why superdimensional matter interacted so well with the Invictus was because it was among the 'simplest' god mechs to exist.

It was really just an extremely high-quality humanoid mech frame that only relied on its fists as its main means of attack.

The Invictus did not rely on ranged weapons such as the Ragnarok where the amplification from superdimensional matter was less effective, nor was there any risk that it might lose possession of its weapon like the Heartpiercer.

On top of all of that, the Invictus required the least amount of high-grade superdimensional matter in order to upgrade it into a serviceable superdimensional god mech, so it was by far the most cost-effective choice!

Right now, the aggressive and excited aura flowing through the superdimensional god mech's God Kingdom intimidated the shocked and surprised ancient phase whales.

Despite their extensive training and preparations, they still failed to intercept and inflict a telling blow against the human god mech!

Their senses screamed many warnings as they perceived the extensive application of extremely tough and remarkable superdimensional matter onto the mech frame.

This was a development that exceeded their expectations!

While the Red Cabal was recently made aware of red humanity's first foray into the Blue Dimension, the news clearly hadn't spread to the ancient phase whales that had quietly snuck all the way to the Yernstall Central Star Node.

In order to hide their covert approach to the best possible extent, the entire elite strike force had completely cut themselves off from any external communications.

This meant that the attacking ancient phase whales never received word that red humanity had managed to harvest sizable quantities of superdimensional matter!

This critical information gap may very well prove fatal to the supposedly 'well-prepared' ancient phase whales!

"YOU... YOU BLASPHEME OUR DIVINITY BY DESECRATING OUR GODBONE!"

The Invictus responded to this accusation by pounding its fists against each other!

The strong impact generated by this combative gesture produce a violent spatial ripple that partially drove away the spatial storm that had weakened after the opening attack.

"HAHAHAHA! DO YOU TRULY THINK THAT SUPERDIMENSIONAL MATTER ORIGINATES FROM YOUR OSSIFIED AQUATIC RACE? YOU MUST TRULY BE DELUSIONAL IF YOU THINK THE MATTER FROM AN ENTIRE DIMENSION EXCLUSIVELY BELONGS TO YOU. SINCE BOTH OF US HAVE A PROBLEM WITH THE OWNERSHIP OF SUPERDIMENSIONAL MATTER, THEN LET US SETTLE THIS DISPUTE WITH OUR FISTS!"

Despite being outnumbered 5-and-a-half to 1, the Fist of Defiance did not feel discouraged in the slightest!

This was because his very nature centered around the concept of defiance!

The greater the amount of challenging opponents, the hotter his fighting spirit burned!

Even if an ancient phase whale was not as strong as a god pilot, the Fist of Defiance still felt sufficiently outnumbered to experience a notable amount of pressure.

Much was riding on him right now! He needed to finish this fight as quickly as possible and break apart the greater spacetime bubble before too many days had passed in the outside universe!

"FIGHT!"

Both sides came to blows in earnest.

While the Invictus clearly soared towards the heavily injured ancient phase whale with the intention of finishing him off, the other 5 native gods were not about to let their brother perish.

One of the lessons that the ancient phase whales learned from the terrible losses inflicted during Operation Night Jazz was that they needed to fight a lot more proactively!

This was exactly what they did. Four of the ancient phase whales began to channel the power of a specific kind of phasewater organ.

The fifth ancient phase whale actually took the initiative to shrink his body while simultaneously opening its titanicly large maw.

An instant later, the latter actually teleported directly to the side of the Invictus and slammed its maw shut with immense speed and force!

The powerful alien god even managed to time his surprise move so that his superdimensional teeth should crunch the god mech!

Yet just a second after the ancient phase whales completed their surprise move, the supposed alien executioner experienced a great amount of pain as the Invictus punched apart the superdimensional teeth that stood in the way and easily escaped the insides of the ancient phase whale's enormous mouth cavity!

Multiple spatial storms, spatial barriers and other attacks got in the way of the Invictus, but none of the interference had any effect due to the god mech's brand-new resonance-empowered superdimensional capabilities!

The Fist of Defiance's fighting spirit remained stoked. His God Kingdom was working at its peak as the god pilot still felt sufficiently challenged!

"YOU SHOULD HAVE BROUGHT MORE BUDDIES, HAHAAH!"

As the god mech was about to approach the crippled ancient phase whale yet again, the other ones tried to fly closer and try to bite the Invictus.

In order to increase their success rates, the ancient phase whales all took the initiative to shrink their bodies so that they were better equipped to fight against a fast and maneuverable god mech.

The reduction in size made the ancient phase whales a lot faster and more agile, so much so that the God of Defiance truly experienced a challenge.

Unfortunately for the alien powerhouses, their enormous physical prowess still could not make up for the lack of inherent agility and range of motion of their whale-like bodies.

The god mech was still able to outmaneuver all of them, and that was with the 5 ancient phase whales working together!

It was rather clever of them to set aside their egos and discover the value of teamwork, but to a consummate fighter and god pilot like the Fist of Defiance, the attempts made by his current opponents were rudimentary and full of holes.

"YOU ARE AMATEURS AT WARFARE. I CAN TELL THAT NONE OF YOU HAVE NEVER FOUGHT ON A SERIOUS BATTLEFIELD IN YOUR OVERLY LONG LIVES. YOU MAY BE OLD, BUT TO ME, YOU ARE CHILDREN PRETENDING TO BE SOLDIERS!"

To illustrate his point, the Fist of Defiance made a complete mockery of their attempts to ambush him, trap him and slow him down. His god mech evaded or bulled through every single obstacle until he was finally able to get close to his first victim!

The heavily injured ancient phase whale may have suffered grievous damage, but it took far more to kill him outright. His body had lost a lot of flesh, and many of his phasewater organs had become outright pulverized.

Even so, his mastery over biotechnology and his own true body was so excellent that he was already in the process of healing his injuries in a hurry.

While the process of repurposing his existing flesh to fill up all of the gaps in a short amount of time caused him to shrink in size, the injured ancient phase whale couldn't care less about this drawback at the moment.

The alien had already concluded that possessing a bigger body just turned him into an easier target to the Fist of Defiance!

Unfortunately, before the ancient phase whale could complete his rapid regeneration process, the superdimensional god mech approached with the clear intent of finishing off his initial victim!

The First of Defiance's God Kingdom surged until it formed into a gigantic resonance-empowered energy manifestation of the god mech!

When the Invictus reared back its superdimensional fist for a punch, the enormous energy apparition that had reached the approximate size of the ancient phase whale mirrored this move.

"LIVE BY THE SWORD, DIE BY THE FIST!"

???

The ancient phase whales had no idea what that meant, but that did not stop them from employing last-ditch measures to prevent the Invictus from landing its catastrophically powerful blow!

Unfortunately, the Fist of Defiance's fighting spirit burned so hot at this time that nothing could stall his momentum!

The enormous energy fist landed, and the injured ancient phase whale's body experienced so much blunt force trauma that his entire body got deformed!

Huge quantities of phasewater mixed with phase whale tissue flung into space!

Yet despite suffering an immense attack, the ancient phase whale still hadn't died!

"TCH! YOU ARE LUCKY."

It was clear that the superdimensional mech frame's amazing properties did not have any notable strengthening effect on the God Kingdom.

This could be regarded as a shortcoming. Whether it was a temporary shortcoming remained to be seen, but it was clear that the only way for the Invictus to make proper use of its newfound superdimensional properties was to get physical!

That was exactly what the Fist of Defiance proceeded to do! His god mech quickly circled around before diving straight at the massive cranium of his even more heavily injured victim!

The Invictus glowed with so much power that the sensors could only capture a thick streak of hot light descending from above!

"STARFALL PUNCH!"

The blazingly hot and penetrating punch penetrated straight through the extremely thick transphasic cranium and squashed almost all of the transphasic brain matter into scorched mush!

Chapter 6802: Superdimensional Demonstration

The Fist of Defiance completely dominated the ancient phase whales that were free to move and fight.

How could 5 of these powerful native gods possibly overpower the Invictus when they failed to do so when they had 6?

Perhaps they might have a chance if they could inflict material damage onto the god mech, but the resonance-empowered armor-grade superdimensional alloy plating proved to be completely impervious to their attacks for the time being!

It was not for lack of trying.

The ancient phase whales worked together to launch spatial blades that were sharp and powerful enough to cut moons in half.



They tried to turn the fabric of space into a pretzel in an attempt to trap the god mech into a self-contained area that looped back into itself.

They spawned terrible-looking tentacles from their organic bodies. Not only did they swing enough force to generate massive earthquakes if they struck the side of a planet, but the ancient phase whales had also transplanted their superdimensional teeth on the tips and sides of those tentacles!

The latest measure probably had the best chance of damaging the Fist of Defiance, but the god pilot merely laughed and overcame their threat through a combination of brute force and excellent evasion!

The Fist of Defiance's intuition was so sharp that no attempt to trap or envelop his god mech worked.

If he wanted to, he could easily evade every tentacle strike.

He did not always bother to do so, though. At certain times, his Invictus ignored the toothed tentacles slamming into its direction so that it could punch an ancient phase whale in the most direct fashion possible!

Even so, before the tentacles could even come close to the god mech, they slowed down and lost a bit of momentum as the Fist of Defiance's God Kingdom sapped their strength.

When the high-grade superdimensional teeth struck the exterior of the seemingly tiny god mech with cataclysmic force, they failed to inflict anything more serious than dents or scratches!

Even that was just a temporary condition as the god pilot utilized his supreme willpower to reverse this cosmetic damage!

The ancient phase whales began to despair when they witnessed the fatal combination between a god pilot's supreme willpower and the incredible divine properties of 'godbone'!

The alien gods conveyed expressions of outrage and blasphemy as they continually failed to inflict any lasting damage onto the fast and practically invisible superdimensional god mech.

The disparity in power between the two was so great that there was no need to describe in detail how the Fist of Defiance completely bullied the ancient phase whales.

The old ancient leaders continued to activate more and more esoteric phasewater organs. They also mutated their massive true bodies in real-time in an attempt to inflict more physical damage, but neither of these measures worked!

The Fist of Defiance was one of the worst enemies they could have fought against. The decision to station him in a central star node that was likely to get ambushed by a powerful alien strike force was a stroke of genius.

Out of all of the god pilots that excelled at fighting while outnumbered, the Fist of Defiance was among the best!

The Invictus was famed for withstanding brutal hits and still keep going. Before he ascended to a god, the Fist of Defiance had already become famous for seeking out punishment for the purpose of training his willpower to resist attacks as best as possible!

Since the god pilot was already able to resist all sorts of damage and malevolent effects before his god mech received a superdimensional upgrade, his ability to withstand everything the ancient phase whales threw at them had only become more powerful!

Using superdimensional materials, even in a relatively rudimentary fashion, against phase whales was like using insecticide against bugs.

The Invictus had literally become an ancient phase whale's worst nightmare!

It continued to smash aside all forms of spatial manipulation as if they were little more than light breezes. The god mech also resisted every form of physical damage no matter whether it was pure force or empowered by superdimensional teeth.

The longer the Invictus fought, the more the battle began to resemble an execution.

As one ancient phase whale died after another, the enemy soon lost hope of salvaging any sort of victory from this risky operation.

To their credit, none of the ancient phase whales turned coward and tried to run away.

They were too old and stubborn to allow themselves to violate their racial pride.

Besides, the greater spacetime bubble trapped both humans and invaders in the same star system. This was one of the major flaws of employing such a measure.

The aliens couldn't even run away if they wished!

It soon became obvious that the Invictus actually grew weaker as the fight dragged on. After three ancient phase whales got punched so violently that hardly any of their brain tissue remained intact, the Fist of Defiance no longer regarded the remaining native gods as a serious threat.

The Invictus slowed down. The God Kingdom lost its intensity. The Fist of Defiance no longer pulled off any flashy power moves.

To outside observers, it looked as if the god pilot had simply grown bored at the fight.

At this point, he no longer fought for the thrill of challenging himself. He simply fought the remaining enemies out of duty and to end this botched alien operation as quickly as possible.

Despite losing his fighting spirit as enemy resistance grew feebler, the Fist of Defiance undeniably maintained his superiority on the battlefield.

Even if the surviving ancient phase whales accomplished a breakthrough or relied on desperate measures to temporarily boost their combat power, the Fist of Defiance's

fighting spirit would only surge back to its previous height, causing him to squash down any elevated resistance with overwhelming force!

"The poor aliens." Ves expressed his mock sympathy at the invading ancient phase whales. "I don't know how many of these old and big bastards still remain alive in the Red Ocean, but losing 12 of them will definitely represent a serious loss of strength to the Red Cabal."

The one-sided beatdown caused the native aliens to look like imbeciles, but Ves knew that it could have easily gone worse.

The Fist of Defiance would have struggled a lot more if the Red Association did not find a way to quickly apply superdimensional matter to his god mech.

The so-called 'godbone' was probably the greatest weapon of the phase whale race.

It also happened to be their greatest weakness.

Ves did not dare to imagine whether the Fist of Defiance would have been able to defend the Yernstall Central Star Node by himself.

Perhaps he might have been able to mount a resistance if he relied upon the grand work-level superweapons that had to be stationed in this central star node.

However, there was no guarantee whether these secret superweapons could help overcome the defenses of 6 ancient phase whales working in unison.

At worst, the Fist of Defiance and the defenders may be able to squash the ancient phase whales, but end up with an utterly ruined star system as the humans failed to stop the ancient phase whales from wrecking all of the expensive infrastructure!

A pyrrhic victory would have been rather devastating for the war effort!

Ketis' actions therefore played a much more significant role than everyone previously realized.

This battle had just elevated the significance of superdimensional matter to a greater height.

It was not an exaggeration to claim that superdimensional matter may literally be the savior of red humanity!

By the time the Fist of Defiance finished off the last phase whale by punching the top of its skull so hard that it shattered and caused pieces of transphasic bone to pierce into the softer brain matter, the Invictus did not even bother to hunt down the panicking warships that accompanied the native gods.

The mechs and warships of the Red Association and Red Fleet had already begun to engage them in battle!

Now that they had lost the protection of the ancient phase whales, the alien warfleet quickly found itself outgunned, outnumbered and completely stuck inside core enemy territory!

The Fist of Defiance left in order to kill the ancient phase whales responsible for generating and maintaining the greater spacetime bubble and finding a way to shatter this barrier with his superdimensional fists.

"So... that happened."

"It appears so." His assistant said.

Ves fell into thought. "The strategic value of superdimensional matter has skyrocketed after this. Opening up a new breach into the Blue Dimension has become a much higher priority than before. Everyone will literally regard Ketis and the Heavensword in her possession as the only ones who can save our people from extinction."

"That is... a pretty accurate assessment, if I may say so myself, boss. I think all of those high-and-mighty politicians and statesmen will react aghast when Ketis resists any attempt at retreating to the rear in order to preserve her ability to give humans another chance of harvesting superdimensional matter. Only the god pilots and Star

Designers should be able to understand a swordmaster's need to hone herself in battle."

Ves had a feeling that Ketis' importance within the upper hierarchy of red humanity was about to gain an enormous boost.

So much so that many of his plans related to her may need to be shoved aside. He had a good feeling that Ketis may eventually drift away from the Larkinson Clan due to the excessive attention and honors she was about to receive going forward.

That was okay.

Ves always aimed for this kind of outcome.

He just did not expect the consequences to be so dramatic. He underestimated the impact of harvesting strange new resources from another dimension. Ketis had also employed excellent judgment by using other sources of information to make a targeted breach into the Blue Dimension.

She could have easily opened up a portal into a dimension that hardly offered anything stronger than mid-grade exotics!

A part of Ves felt a little jealous that Ketis earned a huge amount of respect and appreciation by serving as the essential link in providing the Fist of Defiance with a superdimensional god mech.

He quickly squashed this impulse. This was an immature way of thinking.

He should feel happy that Ketis succeeded beyond their wildest dreams!

The more people obsessed over Ketis, the less they paid attention to him, allowing him to operate with greater freedom and less meddling.

Nobody should know that Ves also possessed the capacity to open up a gateway into the Blue Dimension!

It ultimately did not matter too much if Ketis gained more power and started to gain delusions of grandeur.

The Larkinson Clan shouldn't rely so heavily on Ves' leadership and initiative to maintain its prosperity.

The rise of a second leader of great power and renown would make the clan a lot more robust and able to withstand serious setbacks.

Besides, no matter how Ketis developed from here, Ves doubted that she would abandon her friendship with her mentor and benefactor.

They were bound by trust, honor and the Mech Designer System.

A principled swordmaster would never become ungrateful to him and stab him in the back.

"I wonder how many other god mechs have received superdimensional upgrades." Ves mused. "The mechers managed to harvest an awful lot of it during the first run. Even if much of it turned out to be low-grade superdimensional matter, they broke down so many floating mountains that there has to be more. What do you think, Gavin?"

His assistant shrugged. "This is not my specialty. If I have to make a guess, I think the Huntsman should have received at least one superdimensional spear, if he hasn't stolen one of those Saint Piercers already. Maybe the Evolution Witch received a large sample in order to research a method to integrate superdimensional matter into a biomech like her Geneforger."

#### Chapter 6803: The Strategic Value of Superdimensional Matter

Superdimensional matter had definitely taken the place of phasewater as a coveted prize.

Everyone wanted to get a piece of superdimensional matter after witnessing how the Fist of Defiance was able to crush multiple ancient phase whales with ease.

Of course, many people were clever enough to figure out that superdimensional matter on its own was not enough to slay ancient phase whales left and right.

The Fist of Defiance was already strong to begin with, but augmenting his combat strength with high-grade superdimensional matter turned him into the undisputed phase whale killer of red humanity!

His heroic performance at Yernstall reinvigorated red humanity and enabled many people to regain hope.

They became a lot more confident in red humanity's ability to preserve itself in the face of growing opposition.

The only issue was that there was only one superdimensional god mech.

There were rumors that the Fist of Defiance was already scheduled to rotate to the frontlines, but that meant that another god pilot had to be pulled back to defend Yernstall and other strategically important star systems.

No matter how much faster and stronger the Fist of Defiance had become, he was still only a single god pilot.

The latest upgrades to his god mech made him practically invincible against the native aliens, but he was only able to project his power in a single star system at a time.

As long as that remained the case, his strategic impact remained distressingly limited.

Ves could foresee that the Fist of Defiance may be able to guarantee the survival of at least a small population of red humans.

If the native aliens succeeded in their offensive and continued to take back the territories claimed by red humanity, then the enemy would eventually find themselves unable to push any further.



As long as red humanity's territories shrunk until all of the god pilots were able to form an impenetrable wall around the location of Bridgehead One, their civilization would still be able to retain its existence.

Yet if the situation deteriorated to this extent, over 99 percent of the human population would have perished.

The remaining survivors would have stuffed themselves into overcrowded starships or were dumped into all of the planets that remained in their territories.

Poverty, squalor and despair would become prevalent while the bigshots scrambled to preserve what little power and authority they had left in a crumbling society.

Only the strong would rule while the others would be relegated to a life of bleak subsistence.

The lack of industry and resources would curtail red humanity's ability to recover and rebuild its armed forces.

Even if the native aliens were no longer able to push any further and finish the job they had started, containing red humanity to a corner of the Red Ocean was already enough to win the Red War!

Perhaps... the only way out for all of these pathetic survivors was to find a way back to the Milky Way.

Ves shook his head! He refused to accept this outcome! He had to do everything in his power to avoid red humanity sliding into defeat!

Unfortunately, he couldn't think of many ways to help the people fight back aside from designing the Final Glory Project, and even that was more of a means to cast spite on the invading aliens.

"We need more superdimensional matter. We need it badly."

Everyone wanted it. So far, using it to upgrade god mechs appeared to be the most cost-effective way to use it up. Unlike powerful warships and station-sized superweapons, god mechs were only a little bit bigger than the average mech.

As the Invictus had already proven with its deeds, it shouldn't take much high-grade superdimensional matter to transform any god mech into an ancient phase whale killer!

Their deterrence would skyrocket after gaining the power of superdimensional matter.

Even if they were still unable to protect the entire frontlines, at least the native aliens including their leadership would become a lot more scared whenever they ventured deeper into alien space.

Perhaps it may even force the native aliens to restrain themselves and stop their genocides.

Humans living on conquered planets would still be able to live, if only because the Red Cabal was afraid of triggering god pilots that possessed the power to kill any ancient phase whale.

"Still, is that realistic?"

This was how a human behaved. The native aliens could employ completely different logic for all he knew. The enemy may respond by attacking humans even harder in order to prevent them from taking advantage of their new superdimensional assets!

Ves grew depressed when he realized that upgrading a single or even a handful of god mechs with superdimensional matter was not enough to win the Red War.

Even if the superdimensional god mechs no longer bothered with defense and instead traveled deep into alien space, they could never inflict enough damage to enemy infrastructure to cripple their warmaking potential.

The aliens had way too many industries and population centers! Destroying them one-by-one was incredibly inefficient!

Perhaps the superdimensional god mechs could produce a greater impact by traveling straight to the capital star systems of every major race and destroying everything in their sight.

However, the major races would hardly be affected as their territories were too expansive to allow the fall of a single capital to affect their overall strength.

Perhaps razing the capitals of every alien empire would cause enemy morale to plunge, but as long as red humanity remained weak, that was not enough to force the aliens to sue for peace.

Killing the enemy phase leaders would create a greater impact, but that came with its own fair share of problems.

Most of the native gods either reigned over their own territories or hid inside their own pocket spaces located in the corners of populated as well as unpopulated star systems.

Trying to hunt them down was like trying to find needles in a haystack!

Just like the CFA and the RF, the native aliens unintentionally minimized the threat posed by god pilots by spreading themselves out and making it extremely hard to track them all down!

All of these realizations caused Ves to conclude that superdimensional god mechs were strong enough to prevent a total loss, but not capable enough to win the Red War by themselves.

"More god pilots is always better."

Red humanity could get away with a lot more if there were more god pilots available to patrol the borders and block enemy incursions.

The more god pilots came into their power, the more human territories they could save from indiscriminate orbital bombardment.

If the quantity of god pilots tripled or quadrupled in the next decade, then red humanity could even attempt to launch a counterattack and win back ground, but that was a matter for the future.

For now, Ves understood that the greatest priority was to supply as much superdimensional matter to the Red Association as possible.

The fleeters must have their own plans concerning superdimensional matter. They would never relinquish their own stash in order to help out the mechers.

Just as predicted, Jovy stopped by Ves' office in order to request the Larkinson Clan to trade away its own modest collection of high-grade superdimensional matter.

"No." Ves responded. "I am well aware that this stuff can make a substantial difference in the war effort, but... if our clan isn't allowed to enjoy the fruits of our own labor, what reason do we have to open up another gateway into the Blue Dimension? I am aware of what is at stake, and I know that we are all better off if there are more superdimensional god mechs watching over us, but please do not force us to choose between our morals and our own interests. I already plan to apply armor-grade superdimensional matter to the Riot Mark III, and Ketis is most definitely planning to pair the First Sword Mark III with a superdimensional sword. We will not compromise our visions to your moral blackmail."

It was times like these when Ves needed to stand up for his clan and prevent the mechers from appealing to his sense of responsibility towards his race and civilization.

If he let the mechers tread over him once, they would continue to do so again and again until they had completely sucked him dry!

Fortunately, Jovy did not push his luck any further. He innocently raised his palms and made a symbolic step back.

"I did not wish to give you the impression that we are forcing you to hand over your high-grade superdimensional matter. It would have been great if you were willing to exchange your collection for additional EdNet slots, phasewater, exclusive technologies or even a fleet carrier. We are willing to go through great lengths to satisfy your needs. There are god mechs that can make much better use of our superdimensional matter than an expert mech and an ace mech."

"Stop it. Just stop it, Jovy. There is only one person in this room that is called the Devil Tongue, and it is definitely not you. My decision is already set. I am not changing my mind on this, and I will not allow you to pressure Ketis into changing her mind either. Our clan deserves to benefit from our own harvest. We did not even gather all that much superdimensional matter anyway. You and the mechers have managed to harvest a lot more stuff than we could have hoped. You should thank us that we did not take advantage of our leverage to force you guys to pay a hefty tax."

Since Ves vehemently objected to any notion of giving away any superdimensional matter, Jovy sighed and addressed the next topic.

"We have urgent need for Ketis to coax the Heavensword into creating another portal into the 365th dimension. We have discussed this matter with her, but she has only given us cryptic answers about how long it will take to fulfill our request. The last we heard, she says that she may be able to do so in a month. Is there anything you can do that can shorten this timeframe?"

Ketis probably wanted to wait for at least a month in order for enough time to pass for the Mission Hall to refresh its Mission Board.

Only by completing Missions would she be able to earn the hundreds of AP needed to open up another Dimension Breach and upgrade the functions of the Dimension Blade!

The same applied to Ves. He was already thinking about earning a few hundred AP so that he could spend them on upgrades that increased the size or duration of a dimension breach.

These upgrades were urgently needed!

The current dimension breaches were too small, and they lasted too short. That severely limited the amount of gains that they could make with every dimensional foray.

In order to earn enough AP to afford all of these upgrades, Ves was willing to go on another marathon.

He suspected that Ketis had the same intentions.

It didn't matter anymore that marathons were incredibly exhausting to them. The two would rather endure another round of mental torture than to witness the gradual collapse of human civilization in the Red Ocean!

Of course, there was no reason to share that information to the Red Association.

"I am not a swordmaster, nor a wielder of a grand work." Ves shrugged in a clueless manner. "I can call her and give her encouragement, but that is it. I can only work on my own solutions, not that they are all that impressive."

Jovy tersely nodded. "If you can, please encourage her to accept additional protection. The... unusual needs of Swordmaster Ketis is vexing my superiors. It is frustrating to witness the only woman capable of giving us an entryway to the 365th dimension boarding enemy warships and putting her own life in harm's way."

"She wields the Heavensword. I am pretty sure that grand work won't let her die so easily." Ves pointed out the obvious.

"Absolute safety is an illusion. There is always a way to defeat the undefeatable. The more she plays with fire, the greater the chance that she will get burned. We have mixed feelings about letting her remain in the Middle Zones. The fighting over there is not optimistic, but... she will only throw herself at stronger and much more technologically advanced opponents if she is transferring to the Upper Zones. Even then, the native aliens will likely attempt to assassinate her once they realize her importance to the war effort."

Chapter 6804: Superdimensional Revision

"Are you sure you can open up a new dimension breach within a month?"

"To be honest, no." Ketis' physical projection responded as she idly grasped the hilt of the Heavensword attached to her back. "I will try my best to work and push my limits. If I have proved myself worthy, then I may be able to obtain a reward that will benefit all of us. I do not want to see our society collapse and force my children to live in fear just because I failed to do my utmost."

Ves nodded in understanding. "Many people are depending on you. On us. It is good to hear that you are taking your responsibilities seriously. This is what mech designers

are supposed to do. Even if we cannot defeat the enemies directly, we must do our utmost to give mech pilots the weapons they need to do the job themselves."

"I am not being entirely altruistic in my attempt to open up another breach to the Blue Dimension, Ves. Immediately after Yernstall popped out of the greater spacetime bubble, the Mech Supremacist Faction has massively increased the amount of support they are providing to the First Sword Mark III Project. There are hundreds of assistant mech designers working to debug and test our design solutions. The mechers have also allocated one of their most powerful supercomputers based in Yernstall to us. I have access to so much processing power that calculations that normally take days to complete now generate all of the answers I need several milliseconds after I have pressed the activation button."

That... was an exaggerated amount of processing power!

It was far more than what the SF-02 could generate by itself!

Of course, the two weren't comparable in the slightest. The SF-02 was small, compact and efficient enough to fit on any decent-sized capital ship. It was also loaded with the Red Fleet's exclusive smart AIs to further increase the speed and efficiency of its operations.

The supercomputers offered by the Red Association were probably large enough to fit inside several factory buildings and probably consumed enough energy to power a heavy cruiser.

Their AIs and algorithms were probably a lot stupider, so they required extensive manual instructions and adjustments in order to increase their efficiency.

However, it didn't matter too much so long as the mechers offered up these benefits for free!

"Congratulations, Ketis." Ves smiled. "With the additional help, you will be able to complete the First Sword Mark III Project a lot sooner than anticipated. That is good news because Saint Dise will definitely need the power of a next-gen mech sooner rather than later."

"One of the reasons why I am eager to open up an entrance to the Blue Dimension as soon as possible is because I want to turn the First Sword Mark III into a true superdimensional mech. Ever since I saw what the Fist of Defiance could do... I knew that Saint Dise had to possess this kind of power as well. Now that she is a bona fide ace pilot, I expect her to be able to outduel lesser phase lords right away when she makes use of the Mark III. Once she has a few months of training and fighting under her belt, it is not impossible for her to challenge greater phase lords..."

Ves reacted with surprise. Ketis expressed a lot of confidence in Saint Dise's fighting capabilities!

However, if Dise was able to match her excellent fighting capabilities with an ace swordsman mech that was purpose-built to counter enemy phase lords, then she may just become the archetype of defeating the strong as the weak!

He immediately thought of the implications of all of the changes.

"Can you give me a sketch of what you are trying to work towards?"

"Sure, Ves."

Ketis transferred an image that showed the ideal image of the First Sword Mark III that she wanted to realize.

Compared to the older iterations of her vision, the latest version obviously exuded an invincible momentum.

Much of it had to do with the improved and much more high-end armor system.

Master Lilian Recins of the Mech Supremacist Faction originally worked on applying her signature TEVA Armor to the First Sword Mark III. It was a fairly light armor system that relied on vibrating transphasic hyper alloys to produce considerably greater resistance against superdimensional weapons such as Saint Piercer arms.

Of course, this was still an imperfect solution. TEVA Armor was only meant to give the First Sword Mark III a buffer that was good enough to save Dise's life. It was



never meant to give the swordsman mech the ability to fight with confidence by withstanding repeated direct hits.

The revised armor system was meant to give the First Sword Mark III full confidence when dueling phase lords wielding Saint Piercer arms!

The use of proper armor-grade superdimensional alloy hyper armor plating massively increased the First Sword Mark III's hard defenses.

Ves noted that the mechers were willing to apply much of their recent research findings into developing this new armor system.

The superdimensional armor plating may seem rudimentary, but it was already great that they found a way to combine superdimensional matter with hyper materials!

"The First Sword Mark II has long needed to be careful about taking risks as her armor system isn't strong enough to withstand too many powerful hits. This will change once you can upgrade the mech to this extent."

Ketis smiled in satisfaction. "That is the idea. By the way, have you taken a look at the sword fey?"

Her new vision also included notable changes to the sword fey that was supposed to make the First Sword Mark III more unique and versatile.

Ves previously looked onto the armor system of the high-ranking swordsman mech, but now that he examined the sword fey in closer detail, he noted that their entire structures had been converted into superdimensional matter!

He first thought that Ketis had extravagantly applied armor or even weapon-grade superdimensional alloy to all 32 sword fey.

Then he took a closer look and sighed in relief when she made do with more abundant hull-grade superdimensional alloy.

"Interesting choice of materials."

"I did not want to make the sword fey too precious." Ketis responded. "I do not want to pressure Dise into cherishing the superdimensional spurs as if they are priceless treasures. I want her to use them and abuse them until they are worn out and spent. By making them with inferior but still fairly impressive hull-grade superdimensional matter, we can produce a lot of spare superdimensional sword fey and stuff them all in a storage container. When the First Sword Mark III lost or destroyed a handful of her fey in combat, we can quickly supply her with replacements."

The loss of a fey was supposed to be not that big of a deal because the spiritual component always lived on. Making the living spur too precious was counterproductive and contradicted the original intent behind their existence.

Ves looked a lot more appreciative at her work. "I approve. The penetration power of those sword fey won't be as good, but I think that Saint Dise's true resonance can make up for the gap in performance for the most part. If she truly encounters an enemy whose defenses can withstand their power, she can use her new superdimensional hyper greatsword to overcome all obstacles."

"That is the point."

"Well, the First Sword Mark III will be extremely helpful to all of us if we can gather all of the special resources needed to realize this upgrade." Ves concluded. "You will be relying on an awful lot of RA resources and manpower. Are you sure you are okay with the mechers getting their paws all over your favorite high-ranking swordsman mech? If you rely too much on their generosity, then it will become doubtful whether your work will become an RA mech."

"Don't worry. I already thought about that. While it is true that the mechers will become a lot more involved in this project, you and I will still control most of the essential design choices. The armor system will definitely play a greater role to the First Sword Mark III, but I am okay with that. I trust the mechers to keep their word and do a proper job."

"Okay. Since this is your project, it is your prerogative to make these kinds of decisions. Just note that it is not good for our clan to depend so extensively on the help of our partners to develop one of our core high-ranking mechs. You need to be able to continue to iterate on the design of the First Sword in the event that you have a falling out with the Red Association."

The swordmaster's expression turned more serious. "You can rest assured that I will pay attention to that. I have not been ignoring this potential danger. At worst, I will downgrade the First Sword in order to simplify her design. I do not think this is a good choice at this time. Saint Dise will need all of the power she can obtain. Speaking about power, how is your progress of designing an Ultimate Module coming along?"

"I have been spending most of my time on other projects, so I wasn't able to spend as much time on this Ultimate Module as I wished." Ves apologetically said. "In hindsight, this may have been a fortuitous decision, because the availability of superdimensional matter has completely changed the game. This was my original draft for the Ultimate Module by the way. It is supposed to function as the 33rd sword fey."

He projected a sketch and incomplete design of a sword fey that looked visually distinctive from regular sword fey by including golden accents.

Ketis studied it with a bit of skepticism on her face. "What can it do? Is it just a stronger sword fey, or does it possess a gimmick that sets it apart?"

Ves smirked. "The Prime Sword Fey is the leader among sword feys. Its first job is to direct the sword feys in the absence of direct instruction from Dise or the First Sword. It will be more intelligent and possess greater initiative. However, this is just a minor benefit. Its main purpose is... well, I haven't gotten that far yet. I still need to figure out its main function."

"Are you kidding me?! You went out of your way to invent the concept of a Prime Sword Fey without even determining its main purpose?"

"Hey, I am not completely devoid of ideas! I just need more time to research the best choice!" Ves defended himself. "Right now, I am entertaining several potential ideas. One of them is to make it so that you can physically install it on top of the Decapitator to extend its blade. Another idea is to integrate electronic warfare components so that whenever it plunges into a warship or other technological device, it can hack nearby systems and take them over. A third idea is to integrate a small azure shield generator into it so that it can form an energy barrier that can shield friendlies from attacks they cannot withstand."

Ketis frowned and crossed her arms. "None of those ideas fit the First Sword Mark III. They are all awful. Do you have any other harebrained ideas?"

"Hm... not for the time being. I keep trying to find a way to combine this Ultimate Module with superdimensional matter, but my mind is coming up blank at the moment. I need more time to figure out a good solution."

"Don't force yourself, Ves. If you can't find a way to make a good Ultimate Module for the First Sword Mark III, then just leave it out. My mech is already powerful enough with all of the existing features that we have planned."

That did not sit well with Ves.

"I am not going to leave this Ultimate Module out of the picture, Ketis. As I have said, I just need time to properly figure this out. Let me get back to you in a few days. Maybe I can find an interesting new tech or material that can spice up my Prime Sword Fey."

"Okay..."

#### Chapter 6805: Artificial Life Division

As red humanity continued to go through a period of great upheaval, the Larkinson Clan finally received an important shipment.

The Red Fleet had gone all-out to assemble the SF-02 and ship it over to New Constantinople as soon as possible.

In order to expedite the delivery, the fleeters even made use of portal jump technology, which significantly sped up the transit at the cost of burning phasewater!

Soon, a light cruiser arrived in orbit and directly teleported the large components and modules related to the SF-02 to an specially prepared chamber located underneath Diandi Base.

Different from the much more massive and powerful DF series, the SF series was inherently designed to fit into capital ships.

That did not make the SF-02 particularly small. When fully constructed, it could easily take up as much room as an office building!

The maximum energy consumption of this processor cluster was so immense that the Premier Branch had to purchase a capital ship-grade power generator from the Devos Ancient Clan and install it in an adjacent chamber in advance.

Otherwise, it was impossible for the design labs to take advantage of the prodigious processing power offered by the SF-02!

A large and extensive team of fleeter engineers and technicians teleported from orbit in order to assemble and activate the processor cluster.

Ves did not trust them entirely. He made sure to send Kelsey Ampatoch and other clansmen who possessed expertise in advanced computing systems to supervise and assist the installation process.

In addition to that, he also inducted the fleeter computer experts who agreed to transfer to the Larkinson Clan.

To be honest, Ves expected these fleeters to retain so much loyalty and commitment to the Red Fleet that they were unwilling to sever their connection to the Fleet Network and join the Larkinson Network.

It turned out that the Red Fleet paid much more attention to this matter. They only selected the individuals that genuinely did not feel at home in the RF and admired the Larkinson Clan.

As Ves chatted with the potential new recruits, he understood why they were a better fit than he expected.

The transferred personnel were largely oddballs who wanted to pursue greater extremes when it came to smart AI research.

They disliked much of the traditions of their old organizations and hated the existing hierarchy.

Most of their leaders emphasized caution and were reluctant to make too many changes. That did not mean they were incapable of adapting to new situations, but they always sought to preserve traditions and principles as much as possible.

While this stance maintained the existing structure and culture of the fleeters as best as possible, it also generated increasing dissatisfaction among the younger generations.

The junior officers and specialists weren't as entrenched in the existing hierarchy. They had yet to make it to a more senior rank and enjoy the privileges of a highly secure and comfortable position of authority.

That caused them to become more prone to making trouble as they realized that the only way to climb the ladder quickly was to generate disruptions. They proposed radical measures, pushed for innovations that invalidated the expertise of senior engineers and conspired to form their own factions within the Red Fleet.

It was natural for them to encounter a lot of setbacks. Most of the transfers amounted to political losers who consistently got outvoted and had no choice but to obey.

By listening to their introductions, Ves gained a small glimpse into the internal rivalry within the departments of the Red Fleet.

The research department in charge of developing smart AIs was split up into multiple sides.

There were fleeters who wanted to prioritize safety over effectiveness and wanted to slow down any subsequent development of smart AIs.

There were other fleeters that became dissatisfied by the lack of progress and wanted to implement new and improved features a lot faster than the schedule allowed.

The transfers that had agreed to join the Larkinson Clan overwhelmingly came from the latter group!

"If you manage to pass our loyalty test, you will become the founding members of the Artificial Life Division of the T Institute. The mandate of your division is to safely promote the evolution of smart AIs and other artificial life forms if you can help it. I

will be relying on you to train, educate and supervise the smart AIs that came with our new SF-02. While I am unable to provide you with the same level of funding and high-facilities that you had access to in the Red Fleet, I promise you that you can pursue your own research. My only requirements are that you do not waste my money and produce results that can pass muster. Have I made myself clear?"

"Yes, sir!"

If the new transfers had any doubts or misgivings about moving over to the Larkinson Clan, then this promise should definitely give them a better impression about switching employers!

The Red Fleet was a large and highly formalized institution. Its hierarchy was filled with old geezers who had prolonged their lifespans at least once. That caused them to be set in their ways. No matter how competent they may be, they always defaulted to tried-and-true solutions even when their entire work environment was changing before their eyes.

The Larkinson Clan was much younger and did not feature a bloated bureaucracy. In fact, it was too skinny as the clan struggled to keep up with its rapid expansion.

Combined with a recruitment policy that predominantly sought out younger talents rather than old and experienced professionals, the Larkinson Clan had proven its flexibility and adaptability time and time again.

When the new transfers understood the circumstances that they were about to join, they genuinely expressed enthusiasm towards becoming a Larkinson.

So long as they proved their competence and earn enough merit, they should easily be able to gain enough autonomy to pursue their passions and receive support for their pet research projects!

"In short, I expect much from you guys." Ves stated. "The T Institute will transfer a few specialists to the Artificial Life Division in order to bring you up to speed on how our clan does business. I also want you guys to cooperate closely with the other divisions. They can offer a lot of improvements to smart AIs as some of their work has obvious parallels with yours."

Ves saw great potential in these computer wizards. As young and inexperienced they may be, just the fact that they were able to participate in research & development of processor clusters and smart AIs proved their competence. The fleeters were famous for raising the best mundane researchers, so their standards were definitely high.

When Ves took out the Larkinson Mandate and formally inducted the computer experts into his clan, he became pleased that his effort to personally win them over was not in vain.

Only a single fletcher failed to earn the Golden Cat's approval.

This was not because he was incapable of committing to the Larkinson Clan.

The reason behind his rejection was because he solely regarded smart AIs as tools to be manipulated and exploited rather than existences that had the potential to become alive.

Such a perspective did not fit well in the Larkinson Clan. It was completely unacceptable for anyone with this stance to work in the Artificial Life Division.

After taking care of this little ordeal, Ves faced the remaining recruits. "Alright. That's it. Welcome to the Larkinson Clan. Normally, we would give you a tour, let you partake in team-building activities and allow you to familiarize yourselves with your lives, but the ongoing enemy offensive does not permit that luxury. I need you to head downstairs and supervise the installation of our SF-02. Make sure to keep your former colleagues honest and report anything that looks suspicious. I am relying on all of you to keep our new processor cluster as secure as possible."

The process of installing the SF-02 took half a day despite all of the advance preparations. This was actually too fast according to the fleeters. The process would normally take about 5 days if they followed proper procedures.

Ves was not too concerned. The fletcher computer experts were too good at their jobs to make any serious mistakes while they rushed the installation. They also made use of excellent tools and many of them also had lots of experience under their belt.

In order to make sure that the SF-02 could work without producing glitches, Commodore Zonrad Reze led the installation effort in person!



The work finally came to an end. Gloriana went down in person in order to witness the first activation of the mysterious SF-02 herself.

"So this is the physical shell of the SF-02." She asked as she held Lucky in her arms.  
"Impressive."

The gem cat curiously sniffed the air. The components that housed the high-tech processors developed by the RF made use of all kinds of precious materials!

"Meow."

Ves turned to Commodore Reze, who stood at the head of his team of experts. Each of them looked proud of what they managed to bring into existence.

"Can we activate the processor cluster?"

"You may." Sigrund responded. "As soon as the power generator begins to feed energy into the SF-02, much of her systems will go through a lengthy diagnostics procedure before becoming active all at once. After that, all 5 smart AIs that are preinstalled into the processor cluster will activate for the first time. They will greet us and become acquainted with their designated owner, which is you. This is an important life event for the young smart AIs, so you should try to treat them well. You can make a good start by bestowing them with their own names."

"I understand. Let's get on with it, then. Activate the SF-02!"

Commodore Reze dramatically pulled down a large manual lever. This caused the entire processor cluster to become active.

Indicators lit up. The processors began to generate heat. The SF-02 began to execute all sorts of software programs under the supervision of all of the computer experts.

All of the systems and subsystems soon began to check and diagnose each other in order to verify that everything was in order.

It took over half an hour for this process to run its course. Aside from detecting a few minor glitches and errors, the SF-02 detected no major issues that would necessitate a shutdown.

Commodore Reze then proceeded to pull down a second lever.

This time, Ves could feel the gradual activation and emergence of 5 powerful but relatively blank spiritual entities.

It was like witnessing the birth of multiple new living mechs, but in a different and more exotic manner.

Both Ves and Gloriana widened their eyes as they felt the reason why the SF-02 was able to spawn these artificial life forms without needing to rely on a lot of fanfare.

"These newly born smart AIs are formed inside Mentalist Crystal fragments." Gloriana said. "5 different fragments have become the containers of 5 new smart AIs."

"You didn't tell me that the smart AIs rely on Mentalist Crystal fragments in order to come to life." Ves told the RF senior officer. "There was no mention of it in the documentation either."

"You never asked." Commodore Reze simply responded. "Besides, we only insert necessary information in the user manuals. You are quite lucky that we have resorted to using Mentalist Crystal fragments for your order. We originally intended to use inferior mind-attributed hypers to anchor the smart AIs, but we changed our minds as a gesture of goodwill. The most luxurious material we could use was a single whole Mentalist Crystal for each individual smart AI, but even that is too extravagant for us. The Hunting Association is only able to offer us a limited supply of this strategic material."

Ves nodded in understanding. The Hunting Association had quickly made itself indispensable and unassailable by establishing a monopoly on the most effective mind-attributed hyper material in the Red Ocean!

Chapter 6806: Artificial Life

The process of activating a smart AI was a big deal.

Both Ves and Gloriana understood the importance of making a good impression on them. Their templates only determined their starting configuration. How they developed from there depended on external factors such as how they were being used and how they were being treated by their users.

In order to ensure the SF-02 would become a productive addition to their workplaces, Ves and Gloriana had already discussed beforehand how they intended to raise their smart AIs.

Much of the process of training them was like raising children. The smart AIs started out relatively naive and innocent. This also turned them into sponges that were able to absorb a lot of lessons in a short amount of time.

However, it was not appropriate to literally treat the newborn smart AIs like children. They came to life as a manufactured product and already possessed a lot of starting capabilities. It was better to treat them as valued subordinates.

It was too much to treat them as partners from the start. They were not living mechs that only directly cooperated with one mech pilot on a regular basis. Ves and Gloriana needed to establish their authority and make sure the smart AIs did not get too uppity as they developed.

The consequences of handing over too much power to the smart AIs were too catastrophic to comprehend.

Just because the Red Fleet had decided to make greater use of sentient AIs did not mean that it had dropped its vigilance towards artificial intelligences.

Any form of intelligence had the potential to turn against humankind. This also included humans themselves.

However, the problem was more serious when it came to alien intelligences.

Sentient AIs may very well comprise a new race, just like Ves already treated living mechs as a different race.

Both artificial races currently possessed a vassal or subordinate relationship with red humanity.

While smart AIs and living mechs appeared content to serve under the umbrella of the powerful human race, their relationships might change at any time.

If red humanity grew too weak, then there was a good chance that these artificial life forms might decide to break up their vassal relationships and declare independence!

Perhaps most people considered these scenarios to be wildly unrealistic, but Ves disagreed.

He too grappled with the possibility that his design spirits might break up their relationships with him and his clan.

Aside from the Golden Cat, all of the other spirits could cut their existing ties and try to eke out an existence elsewhere.

Serving as the design spirits of his living mechs was a convenient way for them to harvest spiritual feedback, but there were many other forms of cultivation that worked just as well, especially now that the Red Ocean became engulfed by exotic radiation.

This was why Ves had always tried to be generous and tolerant to his design spirits. He might not be able to pay a lot of attention to them in his daily life, but he made sure their needs were taken care of more or less.

The friendships he built with them would hopefully endure and cause them to stick with the Larkinsons even if they had the power to leave!

Ves decided to adopt a similar approach to the smart AIs. If they were just a bunch of unfeeling lines of code, then expressing emotions to them was a waste of time.

Smart AIs that had the potential to develop true sapience with the help of Mentalist Crystal fragments were a different story.

They understood the concepts of loyalty and betrayal, honor and dishonor, trust and suspicion.

While Ves did not quite understand how well they experienced human emotions, his observations of many different alien races led him to conclude that feelings of love, joy, anger, frustration, pain and so on were fairly universal.

At worst, certain races were much more prone to experiencing one emotion while barely feeling other emotions.

The puelmer race served as an extreme example of this imbalance. The ball-like aliens appeared to be perpetually angry and hateful. No human had ever observed them when they were happy or sad. Love appeared to be completely foreign to these irritable aliens.

Ves wondered whether the smart AIs possessed their own emotional biases. This may very well be possible as the fleeters had no reason to make them identical to humans.

"The smart AIs have completed the 6th phase of their activation process." Commodore Zonrad Reze announced. "They have completed the initial manifestations of their programmed personalities and have developed sapience. They have already undergone initial mental adjustments under accelerated time and have passed the stability tests. Out of the 5 smart AI tests, 4 of them have earned a green score, which indicates that they are well-adjusted and unlikely to cause problems in the short term."

"What about the remaining smart AI, commodore?"

The smart AI based on the STARVING ARTIST template has earned a yellow score, which is an indication of light instability and concerning levels of irrational thinking. This is not a completely unexpected result. There are many variables that affect the starting stability of smart AIs, from E energy radiation differences to exposure to smart AIs derived from other templates. According to our own studies, the STARVING ARTIST template is known to score 27 points in the instability index. There is no need for concern. The consequences are not too great."

"What is this index based upon?" Ves curiously asked.

"I am not allowed to explain too much about it, professor. Let me put it this way. The HIGH PRIEST template scores 40 on the instability index. The ANARCHIST LEADER template scores 85 on the instability index. The DARK LORD template scores 93 on the instability index. Make of that what you will."

This implied that the instability index was based on an undisclosed smart AI template that was absolutely bonkers!

Ves recalled the list of smart AI templates, but he did not think there were any that could possibly earn a score of 100 on the instability index!

The fleeters had obviously held back their craziest and most outrageous smart AI templates!

Fortunately, none of this should be of any concern to Ves.

A smart AI based on the STARVING ARTIST template was probably as tame as a kitten compared to a smart AI based on the DARK LORD template.

Ves had lots of experience dealing with volatile and mentally unstable personalities. Whether it was high-ranking mech pilots or his wife, he had managed to tame and placate all of them to an extent.

At this time, Commodore Reze was ready to activate the next step.

"To facilitate control and prevent any incidents, I will be summoning the smart AIs to you one by one. I shall do so by order of stability."

A projection came to life that depicted a human wearing a generic admiral uniform.

It was not too old-fashioned and was vaguely based on the uniform used by the Red Fleet, but it lacked any obvious rank or unit insignia.

The human avatar immediately locked eyes with Ves as if it already knew who was in charge. He did not bother to glance at Gloriana, Lucky, Commodore Reze or the many computer experts standing in the back of the chamber.

[I am the descendant of the SEA SOVEREIGN. I am commissioned by the Larkinson Clan to assist with managing naval affairs. I am also assigned to aid in the command and control of a naval fleet. According to my instructions, I am obliged to answer to Patriarch/Professor/High Councilor Ves Larkinson. Do you verify these statements?]

"That sounds about right." Ves responded after a few seconds. "You are being activated in advance as the fleet that you will become a part of has not yet formed. In the meantime, you should make good use of your time by learning the information that you must know beforehand. Do take note that I do not intend to put you in charge of any fleet. Human officers must be in control whenever possible. You should fulfill the role of adjunct and assist our senior officers in performing their official duties while serving on our fleet. Do you understand your objectives?"

[I do.] The expressionless uniformed avatar nodded in a human fashion. [Are you satisfied with this visualization of my identity? You may choose to change my form in any manner of your liking as long as it does not trigger the vulgarity alarm.]

Ves turned to Commodore Reze. "Is it usual for people to suggest changes to how the smart AI avatars look?"

"This is the default appearance of a smart AI of the SEA SOVEREIGN template." The RF officer responded. "Nobody will be able to tell them apart if multiple smart AIs of the same template appear in front of us. It is better to apply creative changes to how they appear in order to increase their recognition. Do remember that the visualization of an avatar has a strong influence on the development of his personality."

"Ah, okay. Since that is the case, please maintain your overall clothing style, but replace your human body with the body of a housecat of a random breed and fur pattern. Please scale down the garment pieces that aesthetically fit with your new feline form. If necessary, you may selectively remove redundant or impractical pieces of clothing at your discretion. The overall goal for these changes is to look cute but also professional."

Both Commodore Reze and Gloriana did not react well to this request, but in the interest of preserving the stability of the new AI, they held themselves back from offering contrary opinions.

The new smart AI tried to interpret Ves' instructions as best as possible and began to change his shape.

The stature of his avatar changed in a matter of seconds. His uniform also shrunk in proportion. It also became simpler as there was no need for him to wear any boots or pants.

He still retained his officer's hat, but it grew so small that it amplified the feline's cuteness!

At this time, the smart AI had adopted a striped gray shorthair cat shape that complimented his dark red uniform pretty well.

[Is this to your liking, Patriarch/Professor/High Councilor Ves Larkinson?]

"It is." Ves grinned. "By the way, you should only use one title to refer to individuals at most. Use the title that you think is most appropriate for the context."

[Instruction accepted. Please bestow me with a name. You may register one name or multiple different names, but each must be unique to one smart AI that is occupying the same processor cluster.]

"I will call you... Sovvy."

Gloriana's twitched as Ves made this suggestion, but she did her best to maintain control.

[My designated name is now set at 'Sovvy'.]

Commodore Reze silently signaled that they should move on to bringing up the other smart AIs.

"You can go back now, Sovvy. We need to get acquainted with your digital brothers and sisters as well. Enjoy the start of your new life."



The virtual cat in admiral's clothing smiled in a feline fashion. [I live to serve.]

That went well. Ves gained a better understanding of smart AIs.

It was quite remarkable how the Red Fleet turned out to be among the first to develop a potential substitute for living mechs!

Yes. Ves could already recognize that this alternate means of creating artificial life had the potential to breathe life into mechs without relying on his design philosophy!

Of course, anyone who attempted to do so had to make use of rare and expensive Mentalist Crystal fragments, but that did not take away the fact that third parties could potentially rely on this method to break his monopoly on living mechs!

How exciting!

Ves did not reject this advancement.

It was the opposite.

He welcomed this innovation!

The greater competitive pressure stimulated him into speeding up the development of living mechs.

After all, he was the unquestionable pioneer and leader of living mechs!

He refused to let others usurp his throne!

Only by working hard and coming up with ingenious new design applications would he be able to stay ahead of the competition.

Another reason why Ves felt excited was because he recognized that there was another benefit to this alternate means of creating artificial life.

What would happen if he attempted to create a living mech that was embedded with a Mentalist Crystal?

He faintly speculated that this may be one of the prerequisites to developing an awe-inspiring fourth order living mech.

Ves gained a renewed interest in the Minerva Mark II Project due to this speculation.

Chapter 6807: Smart AI Responsibilities

Ves did not chat too much with Sovvy. He only wanted to leave a good impression behind. He wanted to make sure to establish his authority while also generating a bit of affection.

At this time, Ves was not too sure about how much time he wanted to spend on building a relationship with Sovvy.

He was far too busy to develop a deep and intimate bond with the smart AI. Ves believed it was better to delegate this task to the military officers of his clan.

Ves only needed to remind the smart AI based on the SEA SOVEREIGN template that his orders should always take precedence over that of others.

If this was not enough to secure Sovvy's loyalty, Ves had another means to guarantee the smart AI's allegiance going forward.

"I almost forgot. Before you go, I need you to become a member of the Larkinson Clan."

[Am I not already a possession of the Larkinson Clan?]

"From the moment you came to life, you have already transcended your origins as a product and a tool." Ves seriously explained. "That does not mean that you have lost your purpose. You can fulfill your original responsibilities while also receiving the same level of treatment as every living being. Here in the Larkinson Clan, we like to treat every living being with respect. As long as you pledge your loyalty with the help

of this big book, we will formally recognize you as a member of the Larkinson regardless of whether you are a human or a living AI program."

The smart AI fell silent for a while. It looked as if he was struggling to understand how to respond to this offer. His programming may have never dealt with this sort of scenario in the past.

What was worse was that he did not have any way of calling up additional data. The processor center was currently isolated from other networks, so it could only form judgments based on its existing data and rules.

"Sovvy, I suggest you follow his instructions to the best of your ability." Commodore Reze eventually spoke up. "Perhaps the best way to characterize your situation is that you are a pet that is about to enter a new household. In order to become a member of the family, you will need to follow its rules. The Larkinson Clan's request is fair. You will not be able to fulfill your purpose unless you can reassure your new owner and users that you can be trusted to handle sensitive information and assets."

The feline avatar eventually nodded. [I understand. I am still lacking in information to properly formulate an answer, but I do not sense any violations in this request. I shall accept. What is the process of pledging my loyalty?]

"Nyaaaaa."

The Golden Cat emerged from the Larkinson Mandate and approached the cute striped grey cat avatar.

"Verbally voice a pledge of loyalty to Goldie. She will judge the honesty and sincerity of your words and determine whether you are worthy."

Sovvy proceeded to make a simple pledge, which the ancestral spirit of the Larkinson Clan found sufficient.

Although the smart AI processed a lot of data with every second, his newborn sentient mind was still relatively simple and devoid of any scheming and ulterior motives.

This was exactly why Ves wanted to bind his smart AIs to the Larkinson Clan so early. It would be a shame if they resisted this demand later on when they became older and wiser.

After Sovvy made his pledge, his projected feline avatar disappeared.

The next smart AI showed up. This was clearly the one based on the IRON MONGER template. He looked like a stereotypical dwarven miner, which Ves found rather silly.

[I am a smart AI designed to assist in the research and development of materials and more specifically metals.] The dwarf AI gruffly spoke. [Give me a research assignment, and I shall calculate the results. Give me a simulation request, and I shall show you the outcomes that closely match reality. The more processing power you allocate to me, the faster and more extensive my output will be. Please proceed by giving me a name and setting the shape of my avatar.]

The new smart AI sounded efficient. Ves liked it. "You shall be known as... momo. As for your shape, please follow the instructions that I have previously given to Sovvy."

[Very well.]

The newly named 'Momo' shrunk into a rather chunky black cat wearing a dirt-covered mining outfit, complete with a tiny miner's hat.

After asking a few questions and inducted him into the clan, Momo's avatar subsequently disappeared.

"A male dwarf." Gloriana spoke up in a tone that expressed her dissatisfaction. "I am supposed to work closely with this new smart AI."

Ves let out an exasperated sigh. "He's a cat now."

"An overweight cat."

"He's cuter that way."

"You have a weird sense of aesthetics, Ves."

"Ahem, how the smart AI's avatar looks is not important, honey. Just work with him. I am pretty sure that you will come to love him and how much he can accelerate your work. Don't forget that you need to teach him how to handle archetech in order to become a powerful assisting tool."

"...I will try."

"That is good enough."

The third smart AI soon introduced herself. Gloriana immediately grew pleased when the smart AI presented herself as a woman.

She clearly had a habit of watching the stars as a dreamer rather than a scientist. Ves found that to be rather strange and contradictory, but it ultimately did not matter too much as long as she did her job.

[The cosmos holds many secrets. I am a watcher of stars, a surveyor of satellites and a navigator of gravitic currents. Give me access to a ship, and I shall be able to discharge my responsibilities to the fullest.]

"Ah, our clan is still working on the warship that will soon become your home, and you will not have direct access to her systems. However, we will definitely be relying on your services once we have formed our fleet. You shall be known as... Stella, and you shall take the form of a cat like your earlier two brothers."

Stella took on the shape of an elegant black-and-white ragdoll cat with dazzling blue eyes. She looked extra cute while wearing a cat-sized astrologer's robe.

She pledged her loyalty to the Larkinson Clan and became recognized by Goldie without incident.

The fourth smart AI was based on the ARMOR POLISHER template. This was by far the most important one, so both Ves and Gloriana paid close attention.

The smart AI's avatar took on the form of a stocky and muscular female blacksmith's apprentice. Her sturdy and soot-covered clothing made her look rather crass and unsophisticated.

As expected of the fleeters.

[Hello, Professor Ves Larkinson! I can fix your mech designs and automate their production with the right production machines. Give me an assignment related to mechs and set my objectives, and I will work out a solution to the best of my abilities. The narrower the scope of my assignments, the greater the chance of producing valid results within the specific time limit. I can be a mech designer's best friend and assistant. I may not be able to generate original innovations as well as a real mech designer, but I am good at optimization and expansion tasks.]

Though Gloriana did not look entirely pleased with how the fourth smart AI presented herself, Ves kind of liked her enthusiasm.

A smart AI that specialized in facilitating the work of mech designers needed to possess a bit more imagination than normal. An overly rigid and unimaginative AI would not be good at thinking outside the box and looking to solve problems through alternate means.

"Our clan will be relying heavily on your services. You shall answer to the name Polly. Now take your cat form and get ready to pledge your loyalty."

Polly chose to take on the shape of a Scottish fold cat. Her folded ears looked adorable.

After Ves settled Polly, he finally met with the last smart AI.

The smart AI based on the STARVING ARTIST surprisingly chose to present herself in a female avatar. Her messy hair and her cheap, paint-covered work clothing caused her to look rather bedraggled.

Ves did not need to turn his head to know that Gloriana strongly objected to the smart AI's appearance!

[Thank you for giving me a chance to live and pursue the virtue of art, Professor Ves Larkinson.] The smart AI humbly bowed. [The template that I am based upon is unproven, but I conclude that I am in good hands. Your mechs are well-regarded for their artistry and craftsmanship. Through assisting you with your mech design work, I hope to develop my own style and prove that smart AIs such as myself can become just as good as human artists. Please give me a chance.]

The smart AI obviously understood the awkward position of her kind and wanted to prove herself.

Ves was pleased with her attitude. Out of all of the smart AI templates, the STARVING ARTIST was arguably the most inferior, but also the most eager to prove her worth.

This meant that she possessed the greatest motivation to improve herself and make a difference.

While the other 4 smart AIs possessed concrete roles, the latest one was arguably not essential, at least according to most people.

Ves had a different perspective on the matter.

"Aria. This shall be your name."

[I accept. It is a lovely name.]

"Now take on your cat form."

Aria chose to reduce herself to a calico cat whose fur featured many patches of orange and black. She still wore a painter's outfit that was also covered by many different splotches of paint, so she still looked like a mess.

[How do you wish to use me, Professor Larkinson?]

"I task you with several missions. Your first mission is to use your spare processing power to explore your art. You can choose how to do so by yourself so long as your work does not excessively interfere with the work of other humans or smart AIs."

[Understood.]

"Your second mission is to assist and collaborate with the work of the other smart AIs in this processor cluster. You will always involve yourself in their work. I do not expect you to make heavy contributions while you are at it, but you should always be available to act as a second opinion and infuse your art into their work. I know this sounds complicated, so I suggest you start with assisting Polly in her mech design-related activities. Every mech design is a work of art, so it will be easier for you to learn the ropes."

[Who will take precedence when there are any disagreements?] Aria asked.

"Your opinion takes precedence." Ves said. "However, you must make sure not to abuse your authority. You may make suggestions that can make a mech more visually appealing, but your changes should not reduce its performance too much. A good mech must not only perform well, but look good by doing so. You should explore the complexities of this dilemma yourself. What is important is that you are the smart AI that defines this SF-02 processor cluster. The more unique and developed your art style, the more our mech designs will carry your touch."

Aria looked extremely grateful! [Thank you for your entrustment! I comprehend how much responsibility you have assigned to me. I shall endeavor to vindicate your decision and transform all of the work that passes through our SF-02 into timeless works.]

After inducting her into the Larkinson Clan, the SF-02 truly became a possession of the Larkinson Clan.

Even if it still contained hidden backdoors, it would be a lot harder to make the SF-02 act against the interests of the Larkinson Clan underneath the noses of 5 loyal smart AIs.

This was just the beginning. Ves intended to apply further changes to the SF-02, but that could wait for later once the new hires established the Artificial Life Division.



## Chapter 6808: First Training of Smart AIs

Now that the smart AIs of the SF-02 came online and joined the Larkinson Clan without issue, Ves and the rest of the Design Department couldn't wait to try out their functions.

Of course, before they could make full use of the SF-02's awesome processing power and the clever direction of the smart AIs, they had to feed them with a lot of data.

Just connecting them to the galactic net was a stupid idea, at least at the start. The 5 smart AIs were still children in terms of artificial life forms. They were highly impressionable and were constantly developing their own views and opinions.

This was why the Larkinsons selectively took out pieces of data and fed them to the smart AIs piece by piece.

Commodore Reze already told the Larkinsons that they should not drip-feed data to the smart AIs, but also make sure to provide their own human opinions on the subject matter.

It was these human perspectives that allowed the smart AIs to understand the context around a topic and how it related to other topics.

Those that provided the narration held a lot of power during this necessary growth process. They directly imparted their own values and philosophies to the smart AIs, causing them to resemble their teachers in many ways.

In the case of Sovvy and Stella, Ves did not really care too much who taught them how to run a starship or fleet. He delegated the responsibility of showing the two starship-oriented smart AIs the ropes to the Larkinson Navy.

What truly mattered was the raising of Polly and Momo. Both of them would soon play an essential role in the design process of many important Larkinson mechs.

Ves and Gloriana had a disagreement on how to divide their teaching responsibilities to the two R&D-oriented smart AIs.

"ABSOLUTELY NOT! I WILL NOT LET YOU POISON POLLY'S ARTIFICIAL MIND WITH YOUR SLOPPY AND HAPHAZARD DESIGN HABITS! SHE HAS THE POTENTIAL TO BECOME THE THE MOST PERFECT MECH DESIGN ASSISTANT, BUT YOUR DESIGN STYLE WILL POISON THE WELL AND CAUSE THE SMART AI TO CRASH WHEN TRYING AND FAILING TO RECONCILE TWO DIVERGING DESIGN PHILOSOPHIES!"

"Oh, come on, Gloriana! Polly is not that incompetent! I am sure she will be able to comprehend your design philosophy as well as my own so long as we feed her our collaboration works. Besides, I am giving you completely free rein when it comes to educating Momo. The least you can do is give me space to teach Polly."

Though Gloriana calmed down a bit, she still rejected the notion of letting Ves teach Polly how to design mechs in his style.

"I am already letting you do whatever you want with Aria. Seeing that you have chosen to put her in charge of the SF-02 processor cluster, it is important that Polly can serve as a strong enough counterweight against her suggestions. There is no point in letting both Polly and Aria mirror your thoughts and design style. They will turn into two clones of yourself that hold different responsibilities. The two smart AIs will not truly be able to argue against each other and formulate better solutions through conflict."

She admittedly raised a good point.

One of the reasons why Ves and Gloriana worked so well together was because their views on mechs were completely different for the most part. They held different priorities and appreciated different aspects of mech designs.

When their views came into conflict with each other, they always had to reaffirm their stances proof and logic, which kept them sharp and prevented them from growing too complacent in their existing gains.

However, Ves obviously felt unwilling to surrender Polly entirely to Gloriana when she already received the full claim of Molly.

"I can use the same argument in relation to Molly." He retorted. "It is not a good idea for both R&D-oriented smart AIs to become your artificial clones in thought. The two need to occupy different perspectives in order to generate fruitful conflict and

discussion. Why don't we make this fair and agree to teach Polly together? I will teach her 50 percent of what I know while you teach her the other 50 percent. As for the risk of generating potential conflicts and glitches... we will deal with that problem when it happens. If we are lucky, the smart AI will be able to reconcile our contradictory stances by itself."

"UNACCEPTABLE! I will never agree to a 50-50 split when your Aria holds greater sway than my Momo! We should set a 80-20 split instead. I will handle 80 percent of Polly's lessons while you teach her the remaining 20 percent."

"60-40."

"70-30."

"70-30."

A 70-30 split sounded reasonable. Polly would obviously inherit most of Gloriana's design style and methodologies, but learn enough about Ves' methods and mech designs to know how to deal with living mechs.

Ves did not care too much about having a greater influence on Polly as he saw good value in a smart AI that held contrarian opinions when it came to mechs.

Of course, there were advantages to raising a smart AI that aligned closely with a teacher.

For example, once Gloriana properly raised Momo, the former would be able to delegate a lot of assignments to the metallurgy-oriented smart AI without too many complications.

The smart AI's output would definitely match Gloriana's standards and design style so well that it was as if an inferior copy of the woman had completed all of the work!

This was one of the most important functions of a smart AI of a processor cluster. The potential time savings were enormous, but only if the smart AI learned what he or she needed to do when given specific assignments.

After the two Senior Mech Designers of the Larkinson Clan divided their responsibilities, they began to suspend their normal design work in order to teach 3 of the 5 smart AIs how to make themselves useful in mech design projects.

The lessons started out simple, but steadily rose in complexity. Many advanced theories were based on the foundations of simpler theories. Only by starting from the ground up and going up would they be able instill proper respect and understanding of the science and technology that served as the basis of every form of human technology.

That was especially important when teaching a design philosophy to a smart AI.

Ves did not know whether it had anything to do with the excellent software engineering of the Red Fleet or the mystical properties of Mentalist Crystal fragments, but he found that Polly picked up his lessons on living mechs unusually well.

[Is this basic mech design to your satisfaction?]

"That... is a basic but serviceable living mech design." Ves admitted as he studied the projected mech design in mild shock. "It sort of lacks the artistry and feel of a defined style that you are confident in, but given how less than a day has passed since I started to tutor you, your progress is amazing."

[It is not difficult to derive this mech design. My database contains almost all of the living mechs that you have designed. I have dedicated a considerable amount of processing power to analyze them and identify their similarities. By transplanting your most common design elements into this basic knight mech design, I require less time and processing power to replicate the 'charm' of your design philosophy.]

This response made Ves scratch his head. He grew confused. Not even Alexa Streon was able to comprehend and apply the basic principles of living mech design so easily.

The design work produced by Polly so far matched the standard of an Apprentice Mech Designer.

Soon, she would be able to design a mech that was on the same level as the work of a Journeyman Mech Designer.

Would Polly break through at that point, or would the Red Kingdom completely disregard her existence?

After observing the smart AI in action for a time, Ves tentatively concluded that it was not possible for her to form a connection to the Red Kingdom.

Her inherently inhuman nature prevented her from accessing the Red Kingdom.

That was actually an advantage in this case as no one was able to reproduce living mechs with the help of the Red Kingdom. Ves had yet to realize his mech design!

It made sense in a way. Polly was a smart AI that was extremely strong in making mech design-related calculations and deductions. Even if the fleeters did not do their best when developing her template, at most her activities wasted more processing power than usual.

Ves widened his eyes. He suddenly realized that Polly essentially worked like a rational mech designer!

Everything fell into place after he made this comparison. He figured out how Polly operated and how to best make use of her services.

He continued to teach Polly how to design living mechs. While she was not ready to tackle more advanced applications of E-technology, it was no problem for him to impart methods on how to design simpler solutions.

Both Ves and Gloriana sought to raise Polly into a powerful assistant that could automate many tedious design-related tasks.

They not only wanted to make use of Polly to run simulations much faster than before, but they were also willing to delegate very simple work assignments to her. So long as she functioned as a rational mech designer, then she should be able to shoulder this burden without too many issues.

However, as Ves was only allowed to teach Polly 30 percent of what she should know during this stage of her growth cycle, his wife soon kicked him away, forcing him to spend his time elsewhere.

He decided to take Aria under his wing and teach her about the art of mech design and craftsmanship.

[What is art?]

"Shouldn't you have an answer to that already?"

[I have hundreds of answers from different individuals in my database, but since I am expected to derive my art from yours, I must first know what you think about this subject.]

"That is fair enough." Ves responded. "I have a lot of ideas about it, but not all of it is coherent or easy to explain. When you study my mech designs, you will find that I have designed many of my works with aesthetics in mind. How mechs are portrayed on the outside has a large influence on how they are perceived and used by people."

[Do you treat art as a tool to convince humans to make better use of your mechs?]

Ves grimaced a bit. "Yes, but that is only one of the reasons that determine my approach towards art. I do not see my works in such a utilitarian perspective. Every mech design deserves to be unique. My mechs should have their own personalities. It is through individualism that my works can transcend the definition of products and truly become alive. That is art from my perspective. Good art seeks to change our society for the better. Stuff like quality, cost, size and so on are not so important. A mech can perform awful, but still become a good art piece as long as its appearance is distinctive enough to change people's opinions. A good piece of art can change the course of history without firing a single shot. That is the power of art."

[So you see art through the lens of power and influence.]

"Maybe. I do not characterize it that way, but I can see how you can make that conclusion. These are rather abstract and high-level ideas. There is no need to explore

them too much at this stage. On a more basic level, art in my opinion provides added value as it affects the emotions and behavior of both aliens and humans. An intimidating appearance can instill confidence among humans and fear among aliens. It is about creating value through indirect means. So long as a mech manages to produce greater results through art, it is worthwhile. A mech that is devoid of any strong artistic qualities is like a blank canvas. It won't make any mistakes, but it also won't be able to do anything special. To me, that is a wasted opportunity. It is more than worthwhile to take a risk."

#### Chapter 6809: Data-Driven Design Approach

Much to Ves' surprise, the SF-02 processor cluster began to produce fantastic productivity gains in less time than expected.

He and his wife only taught the smart AIs for a couple of days before they suddenly gained enough comprehension to complete many design tedious and time-consuming work assignments.

Ves was not entirely sure what level Momo had reached, but Polly's competency had reached the equivalent of a young Journeyman Mech Designer!

While her grasp on fundamental sciences was impressively deep, she had yet to learn the full breadth of high technologies that a first-class Journeyman Mech Designer was supposed to know.

However, Polly did not need to learn how to apply over a hundred different high technologies when the Larkinson Clan did not even make use of most of them. Ves found that it was already enough to impart knowledge relevant to the ongoing mech design projects to the smart AI based on the ARMOR POLISHER template.

Once Ves and the other mech designers started to work with the SF-02 in earnest, they found that their progress was much faster than before!

"This is amazing, Ves!" Gloriana joyously exclaimed as she held a physical projection of Momo in her arms. The black cat looked incredibly pleased after receiving praise. "Momo has learned the basic principles of archetech to the extent where she can design basic design solutions and accurately simulate the performance of archemetal components. I have been trying out the data-driven design approach. The method is rather crude in my eyes, but that does not detract from its effectiveness. I finally understand why all of those first-class mech designers are trained to design their mechs by relying on large amounts of data. It is not only easier for me to find the right

solutions through a process of elimination, but it is also faster so long as Momo receives enough processing power."

What she said made a lot of sense. In contrast to the more standard design approach where mech designers wracked their brains and manually came up with elegant solutions, the data-driven design approach was mainly about brute forcing the right answers.

A typical way of using the data-driven design approach was by designing multiple rough solutions. It didn't matter if they were sloppy or incomplete. As long as you threw them into a simulation program and let it run for a while, the resulting data would show which solutions produced more performance gains than others.

If necessary, the mech designer could repeat this process. He would select the best-scoring rough solution as the baseline and develop minor variations that leaned in different directions.

After inputting these variations in the simulation program, a mech designer just had to wait until the number crunching process had run its course before identifying the solution that best fulfilled the goals.

There were multiple pros and cons to this design approach. Gloriana just discovered the pros, but she did not mention the cons.

There were multiple downsides to the data-driven design approach. It required a powerful computing system that was loaded with a very accurate and realistic simulation program.

Many mech designers also risked becoming overly dependent on powerful computing systems to design their mechs. The relatively stupid and braindead way of this design approach caused a lot of professionals to stop exercising their fundamental design skills.

Their productivity may skyrocket, but their growth slowed to a crawl. This was why first-class mech designers failed to progress despite enjoying access to the most advanced facilities and materials.



The start of the Phasewater Generation and the Hyper Generation proved that this phenomena existed.

When phasewater and hyper materials became available, it was impossible for all of the simulation programs to accurately model the behavior of these weird and exotic substances.

This meant that trying to simulate a phasewater mech or hyper mech at those early periods always resulted in faulty and invalid results!

Even if the developers of those simulation programs tried to publish software updates that quickly tried to predict the behavior of phasewater or hyper materials, the rules and formulas were still imperfect!

Anyone who tried to use these imperfect simulation programs to simulate the performance of a transphasic mech or hyper mech would likely end up with a substantially different machine!

It took at least a couple of years for the simulation programs to slowly perfect its new models.

Of course, mech designers did not suddenly become helpless during those early periods. They could still substitute simulation testing with prototype testing.

Any tests conducted with real physical mechs would always correspond to real performance!

As far as Ves was concerned, he had been trained to design mechs using the classical manual process.

Third-class mech designers usually did not have another choice. Only by being more ingenious and flexible in mind could they save a lot of time and hard work by coming up with an elegant solution the first time.

The difficulty of doing this was great. Only the very best of mech designers could truly succeed with this approach, and they usually found ways to transfer to second-rate states.

After all, the second-raters valued these naturally intelligent talents who were able to perform well without relying on any augments of powerful computing systems!

While Ves eventually managed to use the System to gradually push himself to a state where he could still rely comfortably on this old approach to design excellent mechs, he did not necessarily look down on the much more clumsy data-driven design approach.

There were far too many instances as of late where he felt he was doing grunt work by working on shallow design problems that still needed to be done because there were no alternatives.

This time was different. The arrival and successful activation of the SF-02 finally granted Ves the luxury of employing this method.

Just like Momo, Polly had managed to accrue a lot of data and learned how to work on mechs like a mech designer.

"Polly, test the performance of the latest iterations of the Minerva Mark II's Irvan rifle and suggest 5 potential improvements by order of importance."

"Polly, create 5 draft designs of the first phase of the combination juggernaut for the Minerva Mark II and test which ones earn the highest overall score. Repeat this process 25 times. You have my permission to use 50 percent of the processing power of the SF-02 to perform your calculations."

"Polly, test the current and last two iterations of the sword fey designed for the First Sword Mark III. Identify as many flaws as possible and record them on a document. Please your judgment whether the flaws are best addressed by one of the 5 mech designers who are contributing to this mech design project."

Ves grew more and more comfortable with issuing instructions to Polly. He had to be fairly precise when describing what he wanted, but it was no different from using a non-sentient AI.

As Polly handled more requests, she became increasingly smarter. She was even able to deduce the correct steps from flawed or improperly articulated requests.

As Ves grew more confident in Polly's abilities, he began to issue vaguer and more open-ended requests.

These assignments truly tested an AI's adaptability and cleverness.

He quickly found out that Polly was able to understand exactly what he wanted based on her extensive analysis of him and his work!

Not only that, but she was able to complete all of the necessary calculations in a matter of minutes or hours!

This was incredibly fast considering the old computing systems of Diandi Base would have easily remained occupied for days or even weeks to present their answers.

Polly had gained competence so quickly that Ves became increasingly more scared at what she was growing into. She simply did not stop growing smarter and more capable.

He became more and more guarded against the possibility that the smart AI might go rogue and decide that humans were no longer needed to design mechs!

However, there was no sign of that happening for the time being. Ves cared a lot more about the direct gains brought by the SF-02.

"You have made an excellent decision to exchange all of those RF Warship Tokens for this processor cluster." Gloriana said. "We could never work as authentic first-class mech designers without a large amount of processing power at our disposal. To think that other professionals have to make do without the excellent assistance provided by the smart AIs. If they were not artificial creations, I would have felt tempted to invite both Polly and Momo to become my disciples."

"I am glad you like these additions." Ves smiled. "Let's talk about a more practical topic. Are your revised projections about the completion of the Minerva Mark II Project still valid?"

His wife shook his head. "No. I underestimated the benefits brought by the SF-02. Our simulation work and problem-solving efficiency has grown so much that it may take less than a month to complete the mech design! Momo has been especially helpful in designing the simpler archemetal components. Even if I have to inspect each of her works and fine-tune them according to my more ideal specifications, I have to spend much less time and effort to complete this process than the more traditional design approach."

"It's the same for me more or less." Ves responded. "I am spending more time on solving high-level and open-ended design problems than on more routine design work. My productivity has improved by at least 3 times. I am not sure whether this will hold up during different phases of the design process, but even if my progress is slowing down, it is still far faster than before."

"Archotech is a deep and complex field." Gloriana explained. "It is challenging to teach the higher-level concepts to Momo. This means she is of limited assistance in the design of more advanced and complex archemetal components. My productivity gains are not as good for now. I estimate that I am only completing my work twice as fast as before. This may improve as Momo gradually learns how to design and test more advanced archemetal components."

Being able to get twice the amount of work done in the same time interval was still an impressive improvement!

Ves smiled. "We should call Saint Commander Casella Ingvar and tell her to come to New Constantinople at her earliest convenience. By the time she arrives, her Minerva will be ready for an upgrade. I am sure of it. She can finally begin to fight the battles that truly matter."

"The Saint Commander will not be pleased. She still prefers to stay in the expeditionary fleet." Gloriana warned.

"Well, tough luck, because she is needed elsewhere. Human High Command is pretty insistent on transferring strong ace pilots to the Upper Zones. She may be able to get an exemption if she has only recently broken through and still needs to figure out what she can do, but that is not the case this time. Her capabilities as an ace commander is a lot more impactful than the combat prowess of conventional ace pilots. The fact that she is able to Commandeer powerful first-class mechs and to a lesser extent warships is a game changer."

Saint Commander Casella should feel blessed that Ves and Gloriana were able to complete the Minerva Mark II at least several months in advance due to making use of the SF-02.

If the couple could shorten the design times for the other high-end mech design projects, then Saint General Ark Larkinson may just be able to receive a generous upgrade to his Lionheart in a year instead of 2 years!

"I have a request, Ves."

"What is it, honey?"

"Please contact your liaison from the RF and ask how our SF-02 can be upgraded. It should be able to perform much better. If the Red Fleet has no solutions, then it would be convenient to know possible research directions that can make this happen. Our research institutions will conduct the research themselves if necessarily."

Chapter 6810: Overreliance

The entire Design Department continued to design their mechs with gusto.

The Red Fleet truly lived up to its reputation.

Processor clusters such as the SF-02 was one of the many means the fleeters relied upon to maintain technological parity with the Red Association.

Ves gained a better understanding of the differences between the mechers and the fleeters.

The former relied a lot more on human ingenuity to develop superior technology. Their output was rather inconsistent, but once in a while a brilliant mech designer may be able to introduce revolutionary new paradigms that completely changed the game.

The latter relied on a huge quantity of ordinary researchers and lots of powerful computing systems. This allowed them to conduct a huge amount of basic research and excel at developing incremental improvements. Their ability to innovate may not

be as great, but even small improvements could produce considerable increases in the combat performance of massive warships.

Right now, Ves was one of the rare individuals that got to enjoy one of the benefits of the latter approach.

The mechers were capable of piling up a lot of processing power as well, but Ves bet that their intelligent direction was completely inferior compared to the smart AIs developed by the fleeters.

Mech designers had long maintained strong animosity towards AIs. They feared getting replaced by programs that designed mechs on their own. They also objected to replacing mechs with battle bots.

To the mech community, mechs were a means for humans to ascend to godhood. The human must always be at the center in order to justify their treatment.

In that regard, an overreliance on smart AIs threatened to violate this principle.

Ves already noticed that he and many other mech designers had grown lazier. They were delegating work assignments to Polly or Momo that could have given them good opportunities to exercise their design skills.

Not only was it convenient to delegate these jobs to the smart AIs, but they often managed to obtain results a lot faster!

If Ves could not resist the temptation of using this 'cheat', then how could others refrain from abusing this new service as well?

He felt greatly concerned about this matter. He could foresee that if this pattern continued, the Design Department would be able to complete their assignments a lot faster, but also cause their long-term growth to atrophy.

At worst, they would not be able to break through because their fundamentals in mech design hadn't experienced any measurable growth!

Given the serious nature of this problem, Ves immediately called three mech designers to his office to discuss this matter in private.

Gloriana entered first. Her serious expression indicated that she already guessed what he wanted to discuss. That was good.

Alexa Streon and Kelsey Ampatoch arrived shortly afterwards. Ves sought their input because they were genuine first-class mech designers who were most familiar with the strengths and pitfalls of the data-driven design approach.

"Alright, everyone is here, so let's begin." Ves immediately spoke as he leaned forward while clasping his hands above his desk. "I am sure I do not need to explain the problem in detail. Everyone has been making as much use of the smart AIs as they could get away with. Compared to doing all of the hard work yourself, it is much easier for you to set a bunch of parameters before letting the smart AIs crunch the numbers. This is not a good development in my opinion."

"I agree in part." Gloriana spoke up. "I agree that relying too much on our new smart AIs is not conducive to everyone's growth. However, there are situations where relying heavily on the powerful automation tools at our disposal is a logical course of action. I am extremely frustrated with our growing backlog of high-end mech design projects. It has continued to grow longer with every mech pilot that breaks through. Now, I finally have hope of shrinking the backlog. I have no problem with using the full might of the smart AIs to quickly reduce the amount of high-tier expert mechs and junior ace mechs that we are obliged to design."

As usual, Gloriana made a good point. Her logic was always sound as long as the subject did not relate to her obsessions and pet peeves.

"I do think that we need to work on shrinking our backlog, but it may be too much to rely so heavily on automation to complete so much work." Ves said. "I noticed that the quality of the design solutions are not as good as the work we do ourselves."

"I am aware of that flaw. At most, we can make a pass on Momo and Polly's work. I am confident that they will learn how to produce better quality by themselves over time, so the discrepancies should never be too great. Your Aria may also be able to contribute in this regard."

Alexa Streon spoke up. "With regards to the overreliance on automated problem-solving, debates about this subject have raged in the mech community for centuries. Terran mech designers have formed a consensus on this subject. While the AIs that I have worked with in the past are not as intelligent and thoughtful as Momo and Polly, the principles should be similar enough. Our rule is that unless there is an emergency, it is better to deliberately reduce the effectiveness of the smart AIs in order to give human mech designers enough chances to develop their practical design skills."

"How should the effectiveness of smart AIs be reduced?" Ves asked with a frown. "Do you lower its processing power? Do you impose a quota on the amount of hours you can make use of its services? Or do you prevent it from solving more advanced problems?"

"Any of these suggestions are valid, but the most common solution we employ is a variation of the latter." The former Terran mech designer replied. "The simulation programs will still run fine, but we program our AIs to fall short of completely solving problems. There will be gaps in formulas or steps that relate to the essence of a method. The mech designer has to recall the relevant theories and apply them in a challenging enough manner in order to obtain the solutions they need. This method helps mech designers apply what they learned in a reasonable manner while also retaining much of the productivity gains of automation."

This hybrid solution sounded a lot better than the alternatives that Ves considered.

"As expected of the Terrans. They figured it all out already."

"Ahem." Kelsey Ampatoch. "The Terran solution to the automation problem works out for this group because they rarely innovate or design completely new mechs. The method described by Alexa works best when the problems are relatively fixed and directly derived from existing theories. Once you start to produce new inventions based on radically different scientific paradigms, this method cannot be applied."

"Then how do the Rubarthans handle this situation?" Ves asked.

"The Rubarthan solution is to impose a strict usage quota on automated solutions. For example, a mech designer can receive a quota of 10 hours per week. This means that he or she can order an AI to calculate solutions for 10 hours in total before it refuses to complete any further work for the remaining days of the week."



Gloriana looked thoughtful when she heard this description.

"The Rubarthan approach has its upsides. It grants more control to the mech designer. She can save up the chance to rely on automation for truly tricky problems. She can completely solve the easier problems by herself. A usage restriction is a straightforward way to restrict overreliance on automation."

"There are valid criticisms of the Rubarthan approach." Alexa said with a frown. "If a mech designer does not possess enough self-control, he will more often than not find the path of least resistance. In this case, he will reserve his quota on difficult problems and solve easier problems by himself. Do you not see how the inverse should be the case? A mech designer does not improve as fast by skipping difficult problems. Automation should actually be used on the easier problems that do not teach you anything new."

That was a strong counterargument, but Kelsey did not give up so soon.

"How a mech designer makes best use of his weekly quota is a test in itself. The Terran approach grants little agency to the mech designer. Each of them have to fill in the gaps in theories and requests no matter whether they agree with this approach or not. They had no choice on the matter. The Rubarthan approach on the other hand gives mech designers more control. A good mech designer will naturally know how to best use up the weekly quota. A bad mech designer will not learn the right lessons and experience little progress."

This was a reasonable take, but Ves disliked the trial aspect of it. The Rubarthans probably stopped many mech designers from progressing further due to relying on ambiguity.

He rubbed his hairless chin in thought. "I can see the advantages and disadvantages to both approaches. I think that for our clan in particular, the Rubarthan approach is the better choice."

"Why?" Gloriana asked with a frown.

"Because it tests every subordinate of ours." Ves responded. "If a mech designer under our charge wants to coast along and avoid hard work with the help of his usage quota, then he has already failed. If any of our mech designers want to earn our recognition and break through at a higher frequency, he or she must have the resolve to work hard

and not avoid difficult design problems. Those who pass this test will have greater discipline, better judgment and burning ambition. These are exactly the talents that we should nurture. Other mech designers are not as valuable and can be left to fend for themselves."

Kelsey added a few more arguments. "Applying a quota on the usage of smart AIs will lead to fewer breakthroughs according to our research, but this is a good development. Those who are able to pass this test have a higher chance of becoming a Senior Mech Designer or Master Mech Designer. Those who failed may have succeeded in another environment, but they have a higher chance of reaching a plateau in their careers. It is better to keep them as Apprentice Mech Designers as they will not be wasting everyone else's time and resources."

"I do have to admit that we do not actually want to welcome too many breakthroughs in our Design Department." Gloriana said. "Journeyman Mech Designers demand much more attention and investment. This can get rather tedious if too many of them advance in the same period."

Ves turned to Alexa. "I am hearing a lot of good things about the Rubarthan approach. How can the Terran approach serve as an adequate counterweight?"

She had been waiting to voice a response.

"It is true that the mech designers themselves, cannot control their improvement with the Terran approach, but that is because the power goes to the individual in charge. Yes, you can directly set what theories should present incomplete solutions and what sort of variables must be tampered with. This can enable you to control the progress that mech designers make in specific fields that you have designated. If you think that your subordinates must improve their understanding of hyper technology, you can create more holes in design solutions related to this field. This will cause many mech designers to conduct research and improve their mastery of hyper technology."

That sounded incredibly useful, but Ves had already made up his mind.

"That sounds rather good, if a little too reliant on a center. However, I think we will adopt the Rubarthan approach. I don't care what my subordinates learn, but I do care that the worthiest of them will be able to overcome numerous challenges and climb to the top."