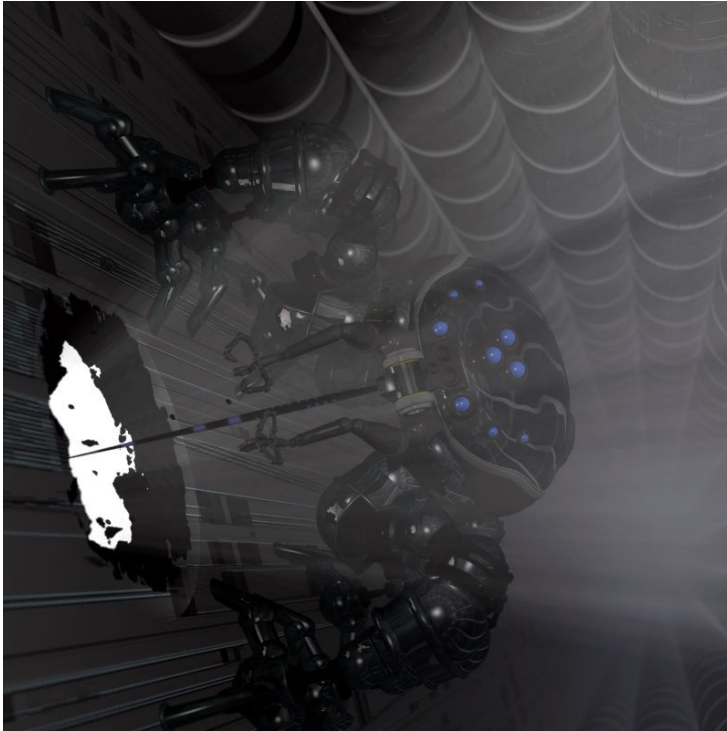


Gremlins



Gremlins are sabotage bots, intended to disrupt infrastructure for the enemy. A typical gremlin is a tiny bot equipped with rudimentary sensors and manipulators, controlled by simple behaviours that make it seek out and destroy its targets (such as power cables, security systems or nanohives). The simplest gremlins are just gnatbots that are printed and spread out, destroying themselves and the targets when they meet. More advanced models are quite mobile and able to attack several times. The most advanced gremlins are self-replicating: they either contain nanohives that can produce copies, or they are able to hack other cornucopia machines to produce gremlins.

Automated sabotage was an important part of fifth-generation warfare. Evolving from online distributed denial of service attacks and botnets, it became increasingly sophisticated over time: scripted swatting, automated deathlist management, political phishing, warzapper drones, smart dust infiltration, botjacking, semantic sabotage, physical denial of service, jambots, tar baby blobjects, scada seekers, process decontrollers and sabotage swarms, to name just a few of the tools and tricks. The rapid escalation of threats forced an equally rapid escalation of security systems and undermined the ability of slow-moving organisations like national states and traditional megacorporations to survive. By the time of the Fall many groups possessed very dangerous sabotage AI. In retrospect the instability caused by deniable smart attacks clearly contributed to the conflicts and technologies that led to the Fall.

After the Fall automated sabotage has become much less acceptable. On Earth successful sabotage warfare could cripple an economy and make it dependent on outside support. In the post-Fall solar system the same attack could destroy a habitat, killing everybody: the environment is too unforgiving and help too far away. The post-Fall switch to much more robust and paranoid systems, as well as a few inter-polity treaties has decreased the incidence of overt use of gremlins and other automated sabotage. That doesn't mean that nobody is developing them: there are far too many factions that believe the best defence is to be able to cripple attackers.

While nanoswarm gremlins are potentially the most powerful they are also risky to use: a small bot sabotaging systems quietly does not trigger the same level of retaliation a potentially deadly swarm does.

Fully replicating gremlins are weapons of mass destruction and tend to bring down the Planetary Consortium, autonomist militias, Firewall and anybody sane on the perpetrators. A mere wirecutter on the other hand is just a sneaky conventional attack.

Dancing pigs

Trojan objects that releases gremlins or other malware. Some try to infect cornucopia machines or computers when printed, others simply release seeds or gremlins when left undisturbed. Many are apparently desirable and innocuous things such as art, entertainment bots, artificial pets or (fake) antiquities. Many object blueprints found online are dancing pigs, with nasty surprises inserted by grievers or factions opposed to certain activities. [Cost: varies, delivered freely]

Gremlin seeds

Specialized nanohives for producing gremlins. Typical gremlin seeds produce smart corrosives/disassemblers that break down key objects, popcorn fleas, engineer nanoswarms that drill holes randomly, protean swarms that make larger gremlins and of course saboteur nanoswarms. Seeds are usually equipped with thin seeker filaments that plug into nearby sources of power and feedstock, but are otherwise immobile. [Cost: High or Expensive (for High cost gremlins)]

Popcorn antibodies and fleas

Nanofabricated smart dust that reacts to the presence of a particular kind of surface or environment (the "antigen") by "popping" - the dust expands to a gooey mass that sticks strongly to nearby surfaces. This tends to jam sensitive systems such as fine mechanics, sensors, specks or nanohives. The popping condition is set when manufacturing the dust.

A simple form of gremlin is Popcorn Fleas – self-propelled nanoswarm devices that move around randomly until they find a trigger location and pop. Popping also releases a "pheromone" that attracts more fleas to the location. Simple versions are sometimes used for practical jokes where the fleas seek out a particular genome and cause the victim to get glued up with edible goo. In many autonomist habitats anti-gun fleas are used to keep people from making or using weapons – the fleas are drawn to weapons and make them jam.

Treat popcorn fleas as a taggant nanoswarm, but if it encounters a trigger surface it will start popping. Every action turn it will give a -1d10 penalty to rolls involving the target object, cumulative down to -50. This depletes the swarm Durability by 1 per turn. [Cost: Low]

Wirecutter

The "classic" gremlin, a small spider-like bot that climbs around looking for fibre optics, cables or other conduits and then tries to cut through them. While engineer nanoswarms can do the same job, wirecutters are immune to normal anti-nano measures such as bug zappers and can be programmed with various smart evasion techniques, building plans or target priorities.

Frassil Saboteur

Movement rate: 4/12, max velocity 12, armour 2/2, durability 25, wound threshold 5, mobility: walking/jumping

Enhancements: +5 COO, Chameleon Skin, Extra Limbs (8), Grip pads, Pneumatic limbs, knives (-1 AP, 1d10/2 damage)

A standard design, originally used by the European nationalist networks against their autonomist enemies. The spider-like limbs are very strong and equipped with sharp diamond filament edges, allowing it both to

cut cables, snip at inquisitive intruders and escape through very fast freerunning. [Cost: Moderate]

Brainslugs

A botjacker gremlin: it looks for interface ports, enters them and tries to take control of the attached device. If it is successful it may then perform pre-programmed actions such as attacking anything that moves, deliver the gremlin to other interface ports or randomly crash. Some brainslugs also perform wireless mesh attacks. Typically looks like an interface connector with long, thin spider legs that can be folded in; hides as an inert connector when there is anything moving nearby.

Talent Security Brainslug

Movement rate: 4, max velocity 12, armour 2/2, durability 25, wound threshold 5, mobility: walking/jumping

Enhancement: +5 COO, Chameleon Skin, Extra Limbs (8), Grip pads, Shape adjusting.

AI: REF 20, Infosec: 40, Interest [bot models]: 80, Interface: 40, Perception: 40, Disguise: 40

The TS brainslug has an advanced shape adjusting shell that not only allows it to interface with any known interface jack standard, but also makes it very good (+30) at disguising itself as similar-sized objects in the vicinity. [Cost: High]

Limus

Gremlins interfering with habitat ecology. While gardener nanoswarms and direct bioweapons can do much damage, sometimes it is appropriate to have gremlins sabotage hydroponics systems, inject toxic nanoparticles into plants or soil or just kill keystone species. Relatively rare these days, since nanofactory can replace plants in food production.

Jambots

Jambots interfere with sensors. Typically they are mite-like bots that creep up to sensors of a particular type and begin to introduce noise. Optical jambots aim tiny lasers at the sensor, playing holograms or just blinding flashes. Mesh jambots find mesh interfaces and start transmitting on the same frequencies. Sound jambots vibrate receiver membranes or piezoelectric sensors, and so on. More advanced versions infiltrate sensors and begin to spoof signals. Good security design tends to detect that the spoofed signals are not authentic, but the jambot still prevents proper reception.

Gold Dust

Movement rate: 1, velocity: 5, armour: 6, durability: 50, wound threshold: 10, movement: crawl

Enhancements: +5 REF, +5 COO, -10 SOM, grip pads, chameleon skin, dazzler, white noise generator

LenBarTech of Venus designed this jambot, intended for slow infiltration. The dust is a tick-like crawler that moves slowly under a chameleon coat, seeking out the vicinity of cameras and microphones. When given a signal it activates a dazzler that runs as long as it has power. The small size makes the dazzler less effective than a normal one (range only 20 meters), but since it can crawl closer to cameras this is usually not a problem. [Cost: Moderate]

Hornets

Anti-personnel gremlins. Hornet gremlins seek out targets fitting a certain description (e.g. humans, humans wearing uniforms, entities speaking English etc.) and sting them with painful stingers. Some mild versions ("flies") merely try to annoy by buzzing loudly, orbiting heads or other sensory systems and spamming the local mesh.

Autonomous Defence Inc. Tarantula Hawk

Movement: 8/40, velocity: 60, armour: 14/12, durability: 25, wound threshold: 5, wings
Enhancements: 360-degree vision, enhanced hearing, enhanced vision, light combat armour, weapon mount for microwave agonizer (active denial mode)
Skills: Fray 60, Flying 60, Beam weapons 40 (specialization microwaves)

Looking like a big, black cubist insect with metal wings, the tarantula hawk seeks out targets (usually anybody coming within a designated area not having the right identity codes) and directs painful microwave beams at them while flying out of reach. Medusan Shield have used swarms of the hornets to confuse and disable hostage-takers and enemy teams. [Cost: Moderate]

Golden Apples

Gremlins intended to confuse security systems by causing false alarms, spoofing signals or making random mesh attacks. Essentially mobile, embodied kaos Ais.

Hide-and-peek bombs

Explosive or incendiary gremlins that creep around, trying to find an optimal location to settle down and explode (either directly, after a certain time or when receiving a certain signal). Usually looks like small discs with legs.

Autonomous Defence Inc. Dustbunny

Movement: 4, max velocity: 12, armour 2/2, durability 25, wound threshold 5, walker
Enhancements: chameleon skin, grip pads, weapon mount (grenade)
Skills: Demolitions 40, Infiltration 40

A grenadebot, essentially a smart chassis for a microgrenade (Autonomous Defence also has a larger version, the dusthare, can handle standard grenades). When released it tries to crawl to pre-set objective locations and stay out of sight, detonating when the right conditions are met. [Cost: Moderate (grenade not included)]

Larder Beetles

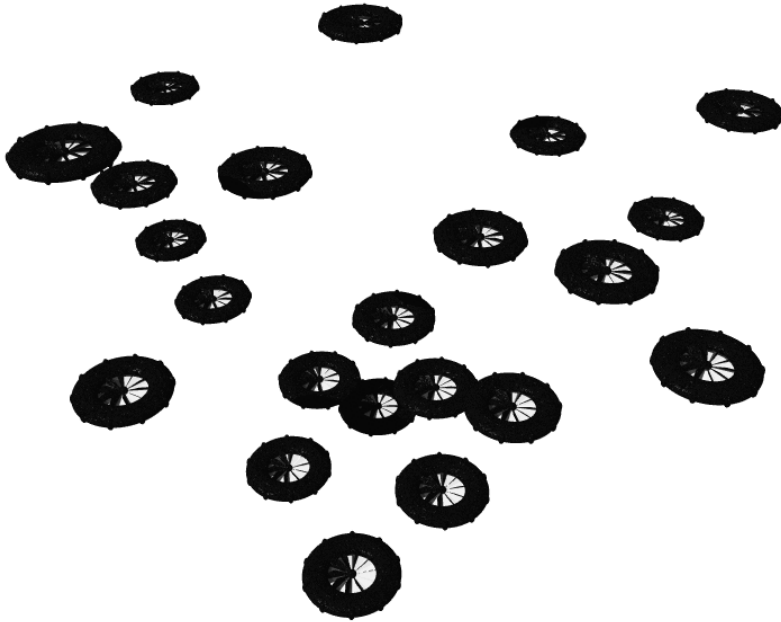
This model specifically tries to destroy the manufacturing capacity of the enemy by hijacking cornucopia machines. The gremlin can exist in several forms. The basic gremlin is a piece of viral software that infiltrates cornucopia machines and takes up residence inside. Every object printed by the machine will contain a copy of the gremlin and act as an infiltration vector: when in the vicinity of another cornucopia machine it attempts to hack and infiltrate it. The gremlin can also produce an active infiltrator, a small beetle-like bot that seeks out machines and hacks them physically, or if that fails, destroys small but vital components. This is the "active mode": normally an infestation starts in "passive mode" with just software infiltration, but when the gremlins detect active countermeasures they directly switch to active mode. In this mode all infected cornucopia machines start manufacturing as many beetles as possible, flooding the environment and preventing any other manufacturing.

Larder beetles can be combined with other gremlins to produce "multi-species attacks". This was one of the major forms of civilian sabotage in the early phase of the Fall, and many people still have nightmares of CMs spewing out insects.

Khapra

Movement rate: 8/40, velocity 60, armour: 2/2, durability 35, wound threshold 7, movement system: rotor
360 degree vision, access jacks, enhanced vision, radar, structural enhancement
AI: Infosec 40, Interest [cornucopia machine specs] 80, Interface: 40 (specialized on CMs), Perception 40 (specialised on recognizing manufacturing devices)
Software: Exploit, Spoof

The Khapra is a modern larder gremlin, developed by the 789 Crew for blackmail and piracy purposes. It is equipped to keep hidden and record usage information that might help it gain control over manufacturing systems. The active form is a small, flying torus surrounding a rotor. [Cost: High]



Rats

Rats are fully self-replicating gremlins, usually controlled by a fairly sophisticated AI. Rat gremlins have a disassembler system that allows them to “eat” suitable material (typically organic plastics and metal, but some models have a taste for cornucopia machine feedstock), turning it into more rats or other forms of gremlins. Normally they are programmed to hide, replicate and, once a signal is given, launch sabotage attacks. Even if the signal is not received the infestation tends to damage whatever environment they are in.

Rats are dangerous and use tends to invite a lot of scrutiny: this is the kind of weapon that nobody wants in space. Firewall agents have a standing order to teach people who use them a nasty lesson, unless of course the rats are being used by Firewall.

Albany Slug

Movement rate: 4/12, velocity: 12, armour: 2/2, durability: 25, wound threshold: 5, movement: snake
Enhancements: +5 COO, chameleon skin, grip pads, shape adjusting, chemical sniffer, specialized
hive for making slugs and disassemblers
Infiltration 60

A nasty gremlin first encountered by Firewall on the Albany aerostat on Venus. The slug is skilled at slithering into tiny crevices and crawlspaces, where it hides and digests material to make more slugs. The slug can make a copy of itself in about 4 hours, and populations have a doubling time of about 5 hours: infestations can destroy habitats (such as Albany) within a few days. When threatened the slug releases a disassembler nanoswarm (which otherwise is used to digest surroundings). [Cost: High]



Cats

Anti-gremlin security bot. Many installations have a number of cats prowling their interiors, looking for suspicious activity and especially foreign bots. Cats report back to the main security server in real-time, especially if they detect something. Cat systems tend to have a library of approaches to stop or disarm foreign bots, ranging from simply crushing them, EMP pulses to releasing various anti-gremlin disassemblers.

Color of the Snow Security Prowler

Movement rate: 4/8, max velocity: 8. armor: 14/12, durability: 30, wound threshold 6, walker/vector-thrust

Enhancements: 360-degree vision, ambidextrous, enhanced vision, t-ray emitter, electrical sense, headlights, radiation sense, utilitool, eelware, light combat armor, hand laser, chameleon skin

A compact, cubical robot with two manipulator arms and two locomotion legs. Intended to quietly patrol installations looking for synthmorph intruders, it monitors not just open spaces but whatever it can observe behind walls, pipes and furniture, comparing it to how it looked last time. In the case of gremlins or other intruders it attempts to disable them. The Prowler has a container for a nanoswarm (but no hive; after use it needs to refill), intended for saboteur or disassembler swarms that are launched when gremlins are detected. [Cost: Moderate, full system involving refill nanohive, print-on-demand prowler blueprints, security AI and online gremlin identification support: Expensive]