



BIONICS



Contents

Bionics

Introduction	4	Internal Prospace Comms	19
Social Effects	4	ScreamerGrip	19
Common Features and Keywords	5	Augmented Audio	19
Combat Bionics	5	Internal Tanked Gaia Terminal	20
Bionics Sheet	5	Medical	20
<i>Borgware</i>	6	Internal Medical Scanner	20
Introduction	6	Hardcore Immune system (HIS)	20
To Suit or Not To Suit	6	Personal Life Support (PLS)	20
Augmentation and Rehabilitation	7	Endobioreorg	20
Repair and Upgrading	7	Bioflush	21
Half Borg Systems	7	Clarity	21
Budget Arm	7	Fatigue compressor	21
Power Arm	8	Nervous system sink	21
Budget Leg	8	Neuroshock	22
replacement joints	8	Sensory	22
Full Borg suits	8	Eyes	22
Gravitron (Borg)	9	Security	23
Chimera (Borg)	9	Subdermal Armour	23
Nightmare (BORG)	10	Miscellaneous	24
Borgware Systems	11	Thermal soaker	24
Mobility	11	Glowderm	24
Grav Pack	11	Anicosmetics	24
Turbine Grav Pack	11	Re-Appearance	24
Re-Entry Upgrade	11	<i>Bioware</i>	25
Communications	12	Introduction	25
Prospace Comms	12	Bioware Classification	25
rink surface port	12	Augmentation	25
ScreamerGrip (Borg)	12	Rehabilitation	25
Technical	13	Bioware Systems	26
Mech kit Forearm	13	Regeneration Bioware	26
Tech kit Forearm	13	Skin regeneration	26
Internal carryall	13	Organ regeneration	26
External power port	13	Limb regeneration	26
Expeditionary	14	Cut and Shut Bioware	27
Micro Self Repair System	14	Appearance alteration	27
Sprung Internal Holster	14	Hypernervous system A	27
Internal Ammunition pod	14	Hypernervous system B	27
Shields	14	Precision Technique	27
<i>Cyberware</i>	15	Neurostabiliser	28
Introduction	15	Bioarmour	28
Cyberware Classification	15	<i>Generic Systems</i>	29
Augmentation	15	Introduction	29
Rehabilitation	16	Rink Systems	29
Repair and Upgrading	16	Rayengine Link (Rink)	29
Cyber Suits	16	Rink Gaia Link	29
Phoenix	17	Rink Weapon Link	30
Deyoramsa	17	Sensory Overloader	30
Gaia Surfer	18		
Cyber Systems	19		
Communication	19		
Rink Skin Port	19		



Foreword

Icar began in 1990 and has since grown and changed beyond recognition of the original. The game grew from two statistics to eighteen and then back to five. Skills changed, guns became rendered and the amount of material grew and grew.

This is in part to the hard work of the author, Rob Lang but also to the tireless desire for people to play the game. While girlfriends come and go, the players are as constant as the North Star, giving support and often criticising developments. Without these players, the game would not have got this far. I would like to thank the following people in particular.

Simon 'Fish' Aubury
Gideon 'Dwain' Moss
Andrew 'Byrnie' O'Byrne
Gareth 'Baldrick' Jones
Peter Ganderton

Bionics Version: 1.3, April 2003
Website: www.icar.co.uk
Email: rob@bullet-systems.com
Copyright: 1990-2003 R. Lang



Bionics

Introduction

For some, humanity is not near enough the top of the food chain. An extra step needs to be taken, beyond that which can be easily made by fitness regimes. Humanity can be augmented by technology. Any un-natural augmentation of a human is known in the group term **Bionics**, regardless whether they are biological based or machine based improvements. The person with the augmentation is referred to as an *Aug* in this section. Bionics is split into three distinct sections. **Borgware** involves completely replacing limbs such that the Aug looks like part of a machine. **Cyberware** goes under the skin, sometimes replacing limbs but normally such that the enhancement does not change the appearance of the Aug. **Bioware** produces flesh and nerves that is woven onto the body of the Aug. Can change the appearance of the Aug, but rarely does. A more detailed description of each is included at the start of each section.

Repair of Bionics is done using the **Bionics Systems** skill (Medical). Borgware can be repaired using a standard mech/tech kit whereas Cyberware and Bioware requires the same machine that was used to install the augmentation. It is possible to fit different types of Bionic onto the same person, unless otherwise stated. A certain amount of common sense is required, if the Aug is a Full Borg with no skin left, then a skin tattoo is not possible. A failure of installation (failed Bionics Systems roll) leads to either a permanent Rehab or a longer Rehab time (GM choice).

Rehabilitation (Rehab) is the immediate effect of being augmented. Normally, the larger the object or the greater its effect on the life of the Aug, the more drastic the Rehab is. Rehabilitation is normally much like physiotherapy (like you would have after breaking a leg in the 21st Century), a number of physical workouts, monitored by a qualified doctor. It can be painful and is often frustrating. If Rehabilitation is not undertaken then the Aug may pick up neurosis and may never fully recover from the Augmentation process. Once rehabilitation is finished, then the Aug will never have any trouble again. Rehab can be concurrent. If the Aug has a Rink (brain-computer interface) fitted, this rehab will take 2 days. If the Aug then has an extra sense (like extended vision) added, this could add another day. Making 3 days. If they were added at the same time, then you *only* take the longer time period (the Rink of 2 days) as both augmentations are Rehabilitated at the same time.

All Bionics are registered with Star Civilisation (SC) upon installation. It is possible to get Bionics fitted without this registration, but it is illegal and can lead to a hefty fine and the doctor will lose their License to do medicine.

All bionics extend lifespan in some form or another. However, the human brain will eventually run out of steam at approximately 220 years after a 10 year period of senility. The better the Bionics and the more attention to detail when Rehabilitating the longer the lifespan. The downside to this is that many of the bionics that allow extended lifespan will lead to the Aug becoming sterile.

Social Effects

One of the largest drawbacks of having bionics is the social effects. The society of the human race moves



at a much slower pace than that of technology and people have difficulty adjusting to those who look different through technology. This social inadequacy is often manifested by fear, hatred or plain racism. Many systems have local laws that ban Bionics over a certain level or to have a separate registration. This restriction is often argued as a infringement of rights, but then for most, Bionics is a choice.

Borgs get the worst treatment as they look the least like humans and also that Borgs can no longer be a parent. This classes them lower in a society where keeping the human race going is the most important consideration. Those with Cyberware often appear as if they are underhanded and sneaky and thus not to be trusted. Most bioware goes un-noticed, but then the enhancements it provides are minimal.

Common Features and Keywords

There are some keywords and features that are common to more than one area of Bionics. They appear in many sections and so are explained here for ease. Also, some bionics systems may appear in two different classes of bionics. If in doubt always use the same sort of bionics that you started with, try not to mix Borg and Cyber systems.

Suit: A collection of limbs and systems that go to make up a Borg or Cyber augmentation.

Frame: A chassis, or metal skeleton about which everything is based

Armour: Protection for the frame and internal systems.

Bioreorganisier (Bio): A device for tuning food into nutrients that keep any human-like bits in working order.

Motor: The powerplant (generator) that the Bionics uses.

Sensors: Additional senses that can be used for sensing the environment. Common ones include:

- **EM:** Electromagnetic, allowing sight into the Infrared and Ultraviolet range.
- **MT:** Motion tracker, for detecting things moving.
- **EG:** Electrogrid, for seeing raw energy being moved or emitted.
- **TO:** Teleoptics, for seeing further.

Combat Bionics

Some bionics have Combat features. On the most simple level, these could be targeting modifiers that helps the augmented character fire weapons more accurately. There are also systems that allow an Aug to have a bonus in close combat. In this case, the bionics system will come with a close combat combo with a Battle modifier. This combo may be used in addition to the 8 they character may have, however it can not be altered and must have the Battle Modifier taken into account. Also, the Combat Bionic combo may be longer than that allowed by the character's Battle. In this case, the player may still use the combat bionic combo because the bionic is designed specifically for combo given.

Bionics Sheet

As soon as a human character takes their first bionic augmentation (regardless how small), they should update their Human / Armour card to a bionics one. This should be used to copy the information onto and gives a feeling of change that should be echoed in the character.



Borgware

Introduction

Of all the Bionics on offer, Borgware is the oldest and most understood. Bionics are favoured by many because of the longevity offered by replacing biological parts with easily serviced energy driven systems. Also, Borgware has the advantages of cost effective Augmentation and repair as well as a wide array of small systems that can upgrade a suit with little cost.

To Suit or Not To Suit

Borgs have a choice of becoming a Half Borg (Borg spine and a limb or two) or a Full Borg (full body replacement). Half Borgs are rare (Rarity: 80%) and tend only to be those people who have lost limbs through accident (or carelessness) and can not afford (or find) a bioweave replacement.

Full Borgs are much more common and can be found in Industry, Sports and in Expeditionary teams. Borgs are also widespread across the Imperium, especially in Star Fleet where human intelligence is required within the tough body of a machine. Thus, Borg suits can be classed as *Military*, *Expeditionary*, *Industrial* and *Sport*. Military suits can only be gained by active service in the Star Fleet and are not included here because of their rarity. All the others are readily available and their uses are listed below.

Expeditionary

The closest suit to a Military one, without actually being one. The expeditionary suit is intended for use *outside* of Imperium space: the Fringe and Lone Systems. Expeditionary suits tend to be fast, tough and well equipped for all environments. They are also the only suit that can come with weapons mounted as standard. Due to the high tolerances of construction, these suits are generally the most expensive.

Industrial

By far the most prevalent suit is the Industrial one. These suits are larger, stronger and equipped such that a person can do their job. Industrial suits are used in Star Docks, Space Ports and any hazardous environment where a human might need to wear an environment suit. The suits tend to be large and bulky. Due to the large numbers in which these suits are produced, they tend to be cost-effective.

Sports

The sports industry took hold of Borg and Cyberware as soon as it realised the athletes would do anything to get an edge on their sport. These suits come in all sorts of variants, mostly designed for a particular sport. There is a 'generic' sub-type. This is for those people who either like to think they are a true athlete or wish to have the longevity without the cost of an Expeditionary suit or the bulk of an Industrial. The cost of these suits tends to vary depending on the application they are put to use but they can be extremely expensive indeed.



Augmentation and Rehabilitation

The Augmentation for Borgware is done using a semi-automated laser surgeon where the brain is removed from the skull of the Aug while immersed in a biogenetic fluid. The brain is then laced with the Rayengine Link (Rink) and inserted into the Borg suit. Connections are then made with the suit and the Rehab process begins. The whole Augmentation process between the user becoming unconscious and being immersed in the fluid and then waking up as a Borg is 20 minutes. The process is a refined and well understood one. Thus it requires an **Easy Bionics Systems** to perform. Few people reject the Augmentation but if they do, they can be rejoined with their old body and the scarring removed.

Rehabilitation is the difficulty in the augmentation of Borgware. The Human brain does not react well to being put into an unfamiliar host for the first time. The first 40 hours of consciousness normally involve convulsions and a fair amount of pain for the new Aug. From there, the Aug must learn to walk and other dexterous tasks. Different suits take different amounts of time to adjust to. The further from humanity the suit is the more time it takes to adjust. After Rehab is finished, it is expected for there to be some additional training, which can be self-taught. Rehabilitation supervision requires a *Bionics Systems* check.

Repair and Upgrading

Borgware is most useful when it comes to upgrading or adding to the suit. It does not require a fully qualified medic and large amounts of equipment, like other Bionics.

Requirements for Repair or Upgrades:

Bionics Systems Roll (Easy)

Bionics Know Roll and Mechasy Systems Roll.

Thus, you do not have to be a qualified medic to be able to update Borg Systems.

Half Borg Systems

Half Borg systems are tailored to the person who requires them. Most Half Borg systems are limb replacements. Normally, a whole arm, leg or sections of the torso are replaced. Any more subtle systems are considered as being Cyberware. Most limb sections require a Borg Backbone. This allows cheaper systems to be created as the replacement limb does not need to be the same size and weight as the user's arm. Some limbs do not require a new backbone, but most do.

Budget Arm			
Cost: 40 000	Rarity: 25%	Rehab: 2 Days Supervised	Manufacturer: Morgan
Requires: Backbone (5000 cr, included)			
Description: A sleek arm that can be covered with a synthetic skin (additional cost: 500). Returns the user to human capacity.			
Game Effect: The arm is not a attractive looking device and some people may be repulsed with it. The synthetic covering does help to mask this but is Easy to spot at anything less than 20 metres. Normally provided as a temporary repair before a more natural version can be afforded. At this point, an undamaged Budget Arm can be traded in for half cost. Arm has human Stats with an AR of 5.			



Power Arm			
Cost: 70 000	Rarity: 35%	Rehab: 8 Days Supervised	Manufacturer: Morgan
Requires: Backbone (5000 cr, included)			
Description: A strong metal arm that is sleek and attractive to look at. Is covered by default in a synthetic covering but comes with a number of coloured ‘sleeves’ for variety. This arm gives the user added strength.			
Game Effect: Easy to spot under 20m, but not physically repugnant to humans. When the arm is used, it gives +2 to Meat. The Statistics of the arm are: AR: 10, HP: 100			

Budget Leg			
Cost: 35 000	Rarity: 22%	Rehab: 4 Days Supervised	Manufacturer: Morgan
Requires: Backbone (5000 cr, included)			
Description: A replacement metal leg with foot included. Allows amputees to regain their mobility in the minimum amount of time.			
Game Effect: If rehab is not completed properly, then the Aug will have a limp. The leg gives no appreciable effect on strength or speed. The Statistics of the Leg are: AR 5, HP: 15. There is no power version of the leg.			

replacement joints			
Cost: 5 000ea	Rarity: 30%	Rehab: 2 Days Supervised	Manufacturer: Morgan
Requires: None			
Description: Shoulders, hips, ribcages and chestplates are all replaceable for the modern human. Each replacement costs just 5K and can be rehabilitated in only two days.			
Game Effect: An extremely old and unpopular method of repairing a human, this involves robotics parts fitted within the human frame. It’s ungainly and ugly to look at. Only a few perverse people would find this attractive. The Aug will have thier hit points returned to them and the location (Torso) will get a AR of 5.			

Full Borg suits

The Borg suit offers the user unparalleled security and safety. However, the mental and sociological effects can be crippling. Although it is not wise to judge a book by its cover, this is often the case for a full borg and they are considered as being untrustworthy by the general populace.



Gravitron (Borg)						
<i>The most popular industrial suit ever; this is an all singing and dancing 0g Borg suit.</i>						
Manufacturer	Uo	Statistics		Armour / Hit Points		
Type	Industrial	Battle	n/a	H	15	3000
Rarity	17%	Meat	40	LA	15	4200
Base Cost	120 000	Shift	7	T	15	8000
Implant Cost	60 000	Soul	-1	RA	15	4200
Height	2.9m	Wit	n/a	LL	15	5000
Weight	960kg	Stun	300	RL	15	5000
Frame: Tungsten Sinite		Augmentation: Standard Borgware laser surgery system.				
Armour: Woven Plasticermaic		Rehabilitation: 25 days under supervision. Then 5 days at with pre-augmentation statistics before Bionic stats begin. Lastly, 5 days of equipment training and flying lessons (non-essential).				
Bio: 0g Vacuum Capable 400hrs survival		Repair Modifier: Easy.				
Motor: Poraq Enostore G.						
Sensors: EM, TMS.						
Additional Systems:						
Grav Pack (Sp: 20. Accel: 10. Mano: 0)						
Glowing Skin (Lights the area up to 50m without dazzle)						
Shakespear Mech Kit Forearm (All the equipment found in a Shakespear Mech Kit).						
Shields: 1 Globe.						

Chimera (Borg)						
<i>The entry level expeditionary borg suit. Large and impressive looking with few systems. A good platform for other additional systems.</i>						
Manufacturer	Morgan	Statistics		Armour / Hit Points		
Type	Expeditionary	Battle	n/a	H	25	1000
Rarity	30%	Meat	20	LA	25	2200
Base Cost	80 000	Shift	14	T	25	3000
Implant Cost	80 000	Soul	-1	RA	25	2200
Height	2.8m	Wit	n/a	LL	25	2600
Weight	280kg	Stun	500	RL	25	2600
Frame: Tungsten Sinite		Augmentation: Standard Borgware laser surgery system.				
Armour: Tungsten Sinite Plate		Rehabilitation: 30 days under supervision. Then 10 days at with pre-augmentation statistics before Bionic stats begin.				
Bio: 0g Vacuum Capable 80hrs survival		Repair Modifier: None.				
Motor: Poraq Enostore N.						
Sensors: EM, MT (50m, 360) TMS.						
Additional Systems: None						



Nightmare (BORG)						
<i>The definitive expeditionary Borg suit with all the system required for life in the Lone Systems.</i>						
Manufacturer	Uo	Statistics		Armour / Hit Points		
Type	Expeditionary	Battle	n/a	H	55	7000
Rarity	82%	Meat	32	LA	45	9000
Base Cost	1.4M	Shift	16	T	55	12000
Implant Cost	200 000	Soul	-2	RA	45	9000
Height	2.9m	Wit	n/a	LL	45	11000
Weight	600kg	Stun	800	RL	45	11000
Frame: Tungsten Sinite		Augmentation: Standard Borgware laser surgery system.				
Armour: Tungsten Sinite Plate		Rehabilitation: 60 days under supervision. Then 40 days at with pre-augmentation statistics before Bionic stats begin.				
Bio: 0g Vacuum Capable 200 days.		Repair Modifier: Taxing.				
Motor: Poraq Enostore NG2.						
Sensors: EM, MT (50m, 360) TMS, EG.						
Additional Systems:						
Hyper Turbine Grav Pack (Speed:120. Acceleration: 30. Manouvre: 20)						
Glowing Skin (Lights the area up to 50m without dazzle)						
Shakespear Mech Kit Forearm (All the equipment found in a Shakespear Mech Kit).						
Shields: 10 Globe + heat sheild.						
Point to Point (PTP) Light Jump Engine (LJS: 1)						
Orbit Capable (5 hours surface to low orbit, 2 hours orbit to surface)						
Ammo Store (7.4 Chain only, 2600 rounds)						
Internal Gaia Card						
Internal Prospace Comms						
2 x Sprung Internal Holster						
Micro Self Repair System						



Borgware Systems

This section includes additional systems that can be added to your Borg suit (requires Bionics Systems roll). One of the advantages to being a Borg is the ease in which upgrades can be done. Upgrades do not really require a medic (unless the upgrade is far reaching). All of these upgrades require a suit to be fitted first. The list is broken up into similar types of system. For details of the Rayengine Link (Rink), check the Cyberware section.

Mobility

Grav Pack				
Cost: 2300	Rarity: 40%	Rehab: Nil	Manufacturer: Morgan	Requires: Nil
Description: A Grav engine fitted to the suit (normally on the back). Allows the Aug to fly unaided. This does not have turbines.				
Game Effect: Speed: 20. Acceleration: 10. Manouvre: 0. Use the Pilot Grav skill branch for any combat or general manouvring.				

Turbine Grav Pack				
Cost: 4600	Rarity: 55%	Rehab: Nil	Manufacturer: Morgan	Requires: Nil
Description: A powerful Grav engine with two large acceleration turbines to assist in flight. Fitted to back. It's not advisable to stand behind the pack when fired as turbines release a heat blast				
Game Effect: Speed: 60. Acceleration: 30. Manouvre: 10. Use the Pilot Grav skill branch for any combat or general manouvring. Pack shows up on EM when in use.				

Re-Entry Upgrade				
Cost: 50 000	Rarity: 75%	Rehab: 2 Days Supervised	Manufacturer: Morgan	
Requires: 0g Vacuum (space) Capable Suit with Turbine Grav Pack and TMS sensors.				
Description: A large conversion to the suit, this allows the suit to re-enter atmosheres from Orbit. Includes a heat shield and boosts the Grav pack to handle breaking.				
Game Effect: Heat shield does not offer any normal shield armour. New Grav Pack: Speed: 120. Acceleration: 80. Manouvre: 20. Use the Pilot Grav skill branch for any combat or general manouvring. Pack shows up on EM when in use. Training in re-entry is including in the Rehab and cost. Orbit to Ground time: 4hrs.				



Communications

Prospace Comms				
Cost: 1500	Rarity: 18%	Rehab: Nil	Manufacturer: Morgan	Requires: Nil
Description: Allows the Aug to communicate with other people with Prospace Comms. Channel has basic encoding. Range: Within system, outside of the system will have a time lag.				
Game Effect: Can be unencoded by friend or by successful Hacking skill roll.				

rink surface port				
Cost: 1200	Rarity: 22%	Rehab: Nil	Manufacturer: Kryotek	Requires: Nil
Description: A miniature Flux cable port situated on the wrist, this allows more software to be loaded onto the Rink without a CRC machine. Aug must consciously open the port before it can be used. Port can also be used to remove software from the port. Much more secure than using Gaia to update software on the Rink.				
Game Effect: No extra game effect.				

ScreamerGrip (Borg)				
Cost: 3600	Rarity: 40%	Rehab: Nil	Manufacturer: Kryotek	Requires: Rink
Description: By gripping a cable, the hand becomes a screamer, allowing the Rink (and user) to access the cable.				
Game Effect: Screamers are only uni-directional and Hacking can not be achieved from the flux cable to the Rink.				





Technical

Mech kit Forearm				
Cost: 1800	Rarity: 25%	Rehab: Nil	Manufacturer: Shakespear	Requires: Nil
Description: Stored internally in the forearm, this is a full Shakespear Mech Kit.				
Game Effect: Includes: Allotape, Energy Cutter, Torque Gun and Allosealer (see Shakespear Mech kit for details).				

Tech kit Forearm				
Cost: 1800	Rarity: 25%	Rehab: Nil	Manufacturer: Shakespear	Requires: Nil
Description: Stored internally in the forearm, this is a full Shakespear Tech Kit.				
Game Effect: Includes: Allotape, Screamer, Poraq 400 Generator (detachable, not the internal power supply), Power Knuckles, Flux Cable. (see Shakespear Tech kit for details).				

Internal carryall				
Cost: 4000	Rarity: 45%	Rehab: Nil	Manufacturer: Uo	Requires: Nil
Description: A space within the Borg suit that can be used for carrying items. The space is located in the torso and is opened by the user, using a complex series of hatches.				
Game Effect: Allows the user to carry anything of 2 encumbrance internally. This included weapons, ammo and tech kits.				

External power port				
Cost: 950	Rarity: 12%	Rehab: Nil	Manufacturer: Morgan	Requires: Nil
Description: A particularly useful system for those creating technical items, this allows flux cable to be attached directly to the Borg suit and power to be drawn. It also allows power to be given to the suit in the case of a problem. Port must be consciously opened.				
Game Effect: No game effect.				



Expeditionary

Micro Self Repair System				
Cost: 120 000	Rarity: 89%	Rehab: 10 days	Manufacturer: Morgan	Requires: Nil
Description: Five thousand robots 1/100 mm across travel around the Borg suit in the energy web and can fix any part of the suit (excluding brain). This rare system is found on expeditionary Borgs working alone in the Lone systems.				
Game Effect: System has a great drain on power, the Borg may not do anything while being repaired by the MSRS. Also, 50% of the Borg's HP must remain for the MSRS to work, without this there will not be enough body to move around in. The repair rate is 1000 HP per hour (fractions of an hour are ok) and will only repair that which is installed in the suit, not items that are held or carried.				

Sprung Internal Holster				
Cost: 1200	Rarity: 32%	Rehab: Nil	Manufacturer: Shakespear	Requires: Nil
Description: Faster than the hand can move, this upgrade can launch any firearm such that the user can be ready to fire immediately. Weapon is stored internally.				
Game Effect: On a successful Wit roll (to notice the situation quick enough), the Aug can draw and fire in the same turn.				

Internal Ammunition pod				
Cost: 1600	Rarity: 18%	Rehab: Nil	Manufacturer: Napalm	Requires: Nil
Description: It is important for any expeditionary Borg to be able to lay down fire without running out of ammunition too quickly. This system allows an internal ammo store, either for chain weapons or for magazine weapons. The system is optimised for Chain weaponry and thus can carry more than magazines will allow.				
Game Effect: Ammo carried in the store does not count on encumbrance. Ammo is not beamed, but fed and thus the usual rules for reloading apply. Ammo pod can carry 2000 rounds of 7.4 or 10 mags of 5.5 or 20 mags of 2.2. Mixed ammo supply is not possible.				

Shields				
Cost: 10 000*	Rarity: 66%	Rehab: Nil	Manufacturer: Morgan	Requires: Nil
Description: Shields offer energy protection for those keen on defense. A shield takes power from the main motor system. However, the more shields that are placed on one system, the more costly they are to install. In multiple shield systems, when one shield drops, the next is brought into play.				
Game Effect: A single shield cost is given above (*). However, if additional shields are being installed then the cost is more. For 2-5 shields, the cost is 20 000 each. For 6-10 shields 30 000 each. For 10-15 shields, 40 000. Unless provided on the Borg sheet, 15 shields is the maximum that can be installed.				



Cyberware

Introduction

The most desirable technology to come from the Aran War is Cyberware. Cyberware allows a person to become augmented to strengths equalling the Borgs without losing humanity in the process. This is done by removing what is under the skin and replacing it with a technological substitute. Thus, Cyberware is a marriage between technology and biology, being able to create a machine that can symbiotically interact with the host (the Aug). Unlike Borgware, a full suit Cyberware does not just keep the brain of the Aug alive but must also maintain skin / hair and any other organs alive.

Cyberware Classification

Cyberware can be split once again into different types. The main two are Hardwire and Wetwire. Hardwire Cyberware are those things that replace human systems. This can be in full (Full Body Replacement) or in part (an artificial liver). It is very rare for a person to just replace a single limb. Wetwire Cybernetics tends to be additions to the human form, such as animated tattoos or a Rayengine Link. Wetwire tends to have much shorter (or even negligible) rehabilitation times, unlike Hardwire. There are places where crossover does occur, in this case they are counted as Hardwire. Due to cost, Hardwire Cyber is much less common than wetwire.

The types of Cyberware suit are *Military*, *Expeditionary*, *Industrial* and *Sports*. These classifications are exactly the same as in the Borgware section. Unlike Borgware, Industrial Cyberware is quite difficult to come by as a Cyberware suit is not as cost effective and versatile as a Borg one.

Augmentation

Augmenting the human inner without damaging the outer is a very difficult and complicated process. Although the technology is well developed and understood, there needs to be many more adjustments than in Borgware augmentation. Before augmentation, the suit or device needs to be configured to match the genetic code of the Aug. This requires the technology of the Cyberware to be much more carefully constructed and malleable to the demands of the Aug, such as height and build adjustment.

Cyberware augmentation requires two different processes, often happening concurrently. They are called the Cyber Razor Cut (CRC) machine and Nanobiogenetics (NBG). Sometimes only one of the two are required, depending on the Cyberware being used. CRC and NBG installation requires the right equipment and a successful *Bionics Systems* roll for each of the processes (if both are required).

Cyber Razor Cut (CRC)

This system is a chair in which the Aug sits. The chair is set in a very accurate beaming field. On another chair is the Cyberware (suit or device). The subject is made unconscious and the suit is beamed from its chair into the Aug while the internals of the Aug are beamed into a biotank for storage. These internals are often sold to offset the cost. The whole process takes approximately 5 minutes.

Nanobiogenetics (NBG)



This uses a special form of Nanobot which has specific instructions on the alteration of the Aug. NBG is used extensively in the joining of Cyber suit and Aug body (especially in linking up the suit and the skin). NBG is essentially hundreds of robots smaller than the human eye can see that are programmed to co-ordinate for a single purpose, the augmentation that they will install. Once the robots are complete, they shutdown and biodegrade within the host's blood system. NBG is applied by injection through a normal hypo. Any materials required for the creation of the structures are inserted using a CRC machine. The Aug must remain within a huge cylindrical sensor field while the NBG can do its work. Depending on the work, NBG can last between 5 minutes and 60 hours.

Usually, the CRC and NBG machines are combined together in a single facility. This single Cyberware facility is called a *Cybershock*.

Rehabilitation

Much like Borgware, the amount of Rehabilitation required for Cyberware depends on the extent to which the human has be augmented. Large changes in physical attributes (Stats) or persona (looks) will extend the time of Rehab. Rehab, much like Borgware, involves learning to walk and operate again. The first 40 hours is always the worst with convulsions and frequent bilious attacks and loss of consciousness.

Repair and Upgrading

Cyberware is generally under the skin and thus requires the same technology to repair and upgrade as was required for the original installation process. If CRC was required for augmentation, then it will be required for repair and upgrade. If large quantities of skin has been removed, then a Bioweave system (see Bioware) will be required to replace it. If the equipment is available then a successful **Bionics Systems** roll is required to repair or upgrade the augmentations. A failure of this could lead to rejection, other systems being damaged or extended rehabilitation times.

Upgrading a suit once fitted is a very rare thing to do because of the prohibitive cost of returning to the Cybershock. Mostly, all the augmentations required are listed and installed all at once. This also has the effect of reducing the Rehabilitation times.

Cyber Suits

There now follws some examples of Cyber suits. This list is far from exhaustive but lists some examples that will be built upon in the future. Smaller systems are included later.



Phoenix						
<i>A hard bitten Cyber suit for the discerning professional Expeditionary.</i>						
Manufacturer	Morgan	Statistics		Armour / Hit Points		
Type	Expeditionary	Battle	n/a	H	35	1800
Rarity	60%	Meat	19	LA	35	3200
Base Cost	180 000	Shift	19	T	35	4500
Implant Cost	200 000	Soul	n/a	RA	35	3200
Height	n/a	Wit	n/a	LL	35	3100
Weight	120kg	Stun	700	RL	35	3100
Frame: Tungsten Sinite		Augmentation: CRC / NBG				
Armour: Tungsten Sinite Woven Plate		Rehabilitation: 40 days under supervision. Then 6 days at with pre-augmentation statistics before Bionic stats begin.				
Bio: 0g Vacuum Capable 10hrs survival		Repair Modifier: Taxing				
Motor: Poraq Enostore CC.						
Sensors: EM, MT (75m, 360) TMS, EG.						
Additional Systems:						
Shield: 2 (3000 pt, Globe).						
Rink Targetting Systems: +10% to Firing Skills.						

Deyoramsa						
<i>Fast and light suit designed for Rail Fighting, sports professional suit.</i>						
Manufacturer	Uo	Statistics		Armour / Hit Points		
Type	Sports	Battle	See Below	H	15	1800
Rarity	60%	Meat	22	LA	15	1200
Base Cost	200 000	Shift	25	T	15	4500
Implant Cost	220 000	Soul	n/a	RA	15	1200
Height	n/a	Wit	n/a	LL	15	2700
Weight	110kg	Stun	900	RL	15	2700
Frame: Tungsten Sinite		Augmentation: CRC / NBG				
Armour: Plasticeramic		Rehabilitation: 40 days under supervision. Then 10 days at with pre-augmentation statistics before Bionic stats begin.				
Bio: Not Vacuum, but No-Oxy survival for 10 hrs		Repair Modifier: Taxing				
Motor: Poraq Enostore CC.						
Sensors: EM, TMS.						
Additional Systems:						
Combat Bionic: (Battle +2)						
Kick Kick Kick Kick Kick.						
Dodge Headbutt Dodge Trip Stamp.						



Gaia Surfer						
<i>A professional Gaia user's suit, reducing the human's detachment from Gaia</i>						
Manufacturer	Uo	Statistics		Armour / Hit Points		
Type	Sports	Battle	n/a	H	15	1200
Rarity	75%	Meat	18	LA	15	800
Base Cost	500 000	Shift	27	T	15	2000
Implant Cost	400 000	Soul	-1	RA	15	800
Height	n/a	Wit	n/a	LL	15	1000
Weight	122kg	Stun	900	RL	15	1000
Frame: Tungsten Sinite		Augmentation: CRC / NBG				
Armour: Plasticeramic		Rehabilitation: 40 days under supervision. Then 25 days at with pre-augmentation statistics before Bionic stats begin.				
Bio: Not Vacuum, but No-Oxy survival for 80 hrs		Repair Modifier: Hard				
Motor: Poraq Enostore CC.						
Sensors: EM, TMS.						
<p>Additional Systems: (Those without description included in system list) <i>Rink Gaia Link, Rink Skin Port, Internal Pro Space Comms, Screamergrip.</i> <i>Hardened Gaia Link:</i> When using Gaia, it is all-encompassing and thus the user gets +10% to any Gaia related task - on top of any other bonus. <i>Internal Gaia Lock:</i> The user may place a Gaia lock while doing tasks within their own consciousness or when talking to people on Gaia elsewhere. <i>Gaia Actuality:</i> User may use Gaia while doing something else without any sort of modifier to either task. For example, user may hack into a machine while firing a weapon. <i>Medical Overlord:</i> If there is a problem with the Rink and the suit appears to be killing the brain, a separate medical system will disconnect the Rink and run the medical system. It may not be hacked as it is not connected to Gaia. A secure Pro Space signal can then be set off as a distress signal, if desired.</p>						



Cyber Systems

Unlike Borgware, not all of these systems require a Cyber suit to be fitted. Information on the Rayengine link can be found in the Generic Systems chapter.

Communication

Rink Skin Port				
Cost: 2000	Rarity: 25%	Rehab: 1 hr	Manufacturer: Kryotek	Requires: Rink
Augmentation: CRC, 1hr			Visible: EG, EM	Repair: Taxing
Description: A miniature Flux cable port situated under the ear, this allows more software to be loaded onto the Rink without a CRC machine. Aug must consciously open the port before it can be used. Port can also be used to remove software from the port. Much more secure than Gaia				
Game Effect: None to effect.				

Internal Prospace Comms				
Cost: 7000	Rarity: 38%	Rehab: 1 hr	Manufacturer: Kryotek	Requires: Nil
Augmentation: CRC + NBG 3hrs			Visible: EG	Repair: Taxing
Description: A powerful encoded prospace communicator with a system wide range. If Rink is fitted then a more powerful encoder can be installed and used.				
Game Effect: Typical encoding is Easy to hack. Rink encoder is Hard to hack.				

ScreamerGrip				
Cost: 9300	Rarity: 67%	Rehab: 5 hrs	Manufacturer: Namsek	Requires: Rink
Augmentation: CRC + NBG 2hrs			Visible: EG	Repair: Taxing
Description: By gripping a cable, the hand becomes a screamer, allowing the Rink (and user) to access the cable. Skin contact not required, although the hand must grip around the cable.				
Game Effect: Screamers are only uni-directional and Hacking can not be achieved from the flux cable to the Rink.				

Augmented Audio				
Cost: 3000	Rarity: 28%	Rehab: 10 hrs	Manufacturer: Morgan	Requires: Nil
Augmentation: CRC, 1hr			Visible: Nil	Repair: Taxing
Description: Boosted sensitivity and frequency range. Also noise limits to stop deafeningly loud sounds. If Rink is fitted then AALock Entity can be loaded onto Rink to allow user to lock onto a single sound.				
Game Effect: +2 to Wit on hearing things.				



Internal Tanked Gaia Terminal				
Cost: 13400	Rarity: 54%	Rehab: 5 hrs	Manufacturer: Kryotek	Requires: Nil
Augmentation: CRC, 1hr			Visible: Nil	Repair: Nil
Description: Not connected to Rink but allows user to use Gaia normally. Gaicard is installed in a switch-on-off clip that allows the Aug to plug or unplug by a flick of the wrist.				
Game Effect: None.				

Medical

Internal Medical Scanner				
Cost: 9000	Rarity: 26%	Rehab: 1 hr	Manufacturer: Sypher	Requires: Rink
Augmentation: CRC + NBG 5hrs			Visible: EG	Repair: Taxing
Description: A sensor package installed under the skin of the hand acts as a medical scanner.				
Game Effect: +20% to Medical Diagnosis, +10% to Surgery.				

Hardcore Immune system (HIS)				
Cost: 22 000	Rarity: 61%	Rehab: 10 hrs	Manufacturer: Sypher	Requires: Nil
Augmentation: CRC + NBG 5hrs			Visible: EG	Repair: Hard
Description: Immune system will now fight any disease without prior immunisation. HIS will adapt to destroy new Virii. If Rink is fitted, then the HIS can be reconfigured to fight off toxins that it would previously not be able to handle.				
Game Effect: +10 Meat against disease rolls.				

Personal Life Support (PLS)				
Cost: 100k	Rarity: 73%	Rehab: 5 hrs	Manufacturer: Sypher	Requires: Rink
Augmentation: CRC + NBG 10hrs			Visible: EG	Repair: Hard
Description: When the vital signs of the Aug (heart or breathing) stop, the PLS kicks in and takes over. Although the body is dead (and will show all the signs of a dead body), the brain will remain alive in an unconscious state. This lasts for 400hrs, after which the local nutrients within the PLS will no longer function.				
Game Effect: Nil				

Endobioreorg				
Cost: 12 000	Rarity: 19%	Rehab: 20 hrs	Manufacturer: Sypher	Requires: Nil
Augmentation: CRC + NBG 30hrs			Visible: EG	Repair: Taxing
Description: Takes the place of stomach and intestines. Breaks down food and produces nutrients from foods that would not have been possible before. Also will break down and reject poisons without entering into the blood stream. If Rink is fitted then a link can be created that informs the Aug of the chemical breakdown found in the food just eaten.				



Game Effect: Already installed in all full suits.

Bioflush

Cost: 4600 **Rarity:** 13% **Rehab:** 40 hrs **Manufacturer:** Sypher **Requires:** Rink

Augmentation: CRC + NBG 20hrs **Visible:** EG **Repair:** Taxing

Description: Removes all toxins (poison, drugs and alcohol) from the blood system. Sometimes causes nausea and brief illness. In extreme cases, makes the Aug unconscious for a short period. Requires 10 hrs recharge between firing with one large meal required during this time (Aug will have a serious case of the munchies).

Game Effect: Illness will occur on a failed Meat roll. Illness lasts for 30 seconds. Unconsciousness occurs on a Meat roll of 10 (critical failure).

Clarity

Cost: 10 500 **Rarity:** 34% **Rehab:** 30 hrs **Manufacturer:** Sypher **Requires:** Nil

Augmentation: CRC + NBG 30hrs **Visible:** EG **Repair:** Taxing

Description: Removes hormones from the system to allow the Aug to concentrate for a split second. Due to the potency of such hormones, they can not be stayed off for more than a split second. May only be fired once every day (40 hrs). Due to the hormones being removed, the character may feel paranoia, fear or pain easily.

Game Effect: When a skill or Wit roll is failed, this being fired will allow the character to re-roll the dice. Take the better value. After the action is over, the character must pass a Meat roll to stave off the feelings of pain and fear.

Fatigue compressor

Cost: 14 000 **Rarity:** 44% **Rehab:** 30 hrs **Manufacturer:** Sypher **Requires:** Nil

Augmentation: CRC + NBG 40hrs **Visible:** EG **Repair:** Hard

Description: Allows the Aug to go for longer without sleep and with no detrimental effects for longer. Does not need to be fired, automatic effect.

Game Effect: Waking span increased from 30hrs to 40+(Meat x 10) hrs. If more than 40hrs is done without sleep, a 20 hour undisturbed sleep is required.

Nervous system sink

Cost: 28 000 **Rarity:** 78% **Rehab:** 60 hrs **Manufacturer:** Sypher **Requires:** Nil

Augmentation: CRC + NBG 20hrs **Visible:** EG **Repair:** Taxing

Description: Reduces central nervous system activity so that the Aug can remain calm while achieving a task. Instantaneous results but can only be fired once between sleep cycles (approximately 40hrs). Allows the user to focus for short time but after may find some tasks difficult.

Game Effect: When fired, the character gets +4 to Soul for 1 minute (20 turns). After this period, the character gets -2 to Soul until sleep has been had.



Neuroshock				
Cost: 53 000	Rarity: 72%	Rehab: 40 hrs	Manufacturer: Sypher	Requires: Nil
Augmentation: CRC + NBG 30hrs			Visible: EG	Repair: Hard
Description: Allows the Aug to regain consciousness without being fired manually. Will wake the Aug up instantaneously. If the Aug is not in a full suit, the next 12 seconds, the Aug will be dazed and confused, able to move but not do any tasks.				
Game Effect: The post shock confusion lasts for 4 turns (12 secs). No skill may be used during this time.				

Sensory

Eyes				
Cost: 150k	Rarity: 28%	Rehab: 120 hrs	Manufacturer: Morgan	Requires: Rink
Augmentation: CRC + NBG 10hrs			Visible: EG	Repair: Taxing
Description: Replaces the eyes of the Aug with extra senses. Included in the installation is the EM sense and a recording facility for the Rink. Also, further software can be added to the Eyes allowing them to perform more functions (included elsewhere). Additional senses cost more: <i>Sense</i> , Rehab (Cost) <i>Teleoptics</i> TO, +10hrs (10 000) <i>Electrogrid</i> EG, +10hrs (25 000) <i>Motion Tracker</i> MT, +15hrs (25 000) <i>Time Motion Space</i> TMS, +15hrs (25 000)				
Game Effect: Apart from the ability to sense better, the character gets +2 to Wit when sensing things.				



Security

Subdermal Armour				
Cost: 10k +	Rarity: 38%	Rehab: 20 hrs	Manufacturer: Morgan	Requires: Nil
Augmentation: CRC + NBG 60hrs			Visible: Nil	Repair: Taxing
<p>Description: Subdermal armour is a favourite amongst security professionals due to the instant protection it gives. All subdermal armour is full body protection, from Skull to Toe. The cost given above is a base cost, on top of which the cost of the type of armour is added. Armour come in the form of plasticeramic, metallic sinite composites and weave. Due to the weight of the armour, the Aug will need to be of reasonable strength to have armour fitted. Some are visible to the human eye.</p>				
<p>Game Effect: Armour specification is: “<i>Name</i>: Minimum Meat (Additional Cost). Statistics” and then any notes.</p> <p><i>Plasticeramic:</i> 3 (10k). H 15, 500. LA 15, 1200. T 15, 2000. RA 15, 1200. LL 15,1600. RL 15,1600</p> <p><i>Oxypolyceramic:</i> 4 (22k). H 23, 1000. LA 23, 1800. T 23, 3200. RA 23, 1800. LL 23,2000. RL 23,2000.</p> <p><i>Polyceramic Weave:</i> 5 (28k). H 30, 1000. LA 30, 1800. T 30, 3200. RA 30, 1800. LL 30,2000. RL 30,2000. -1 to Shift.</p> <p><i>Titanium Sinite Plate:</i> 8 (35k). H 35, 2000. LA 35, 2800. T 35, 4200. RA 35, 2800. LL 35, 3000. RL 35, 3000. Visible to the human eye. -2 to Shift.</p> <p><i>Titanium Sinite Cross Weave:</i> 7 (110k). H 45, 2000. LA 45, 2800. T 45, 4000. RA 45, 2800. LL 45, 3000. RL 45, 3000. -1 to Shift.</p>				





Miscellaneous

Thermal soaker				
Cost: 11 000	Rarity: 64%	Rehab: 10 hrs	Maufacturer: Morgan	Requires: Nil
Augmentation: CRC + NBG 80hrs			Visible: EG	Repair: Taxing
Description: Removes the Aug's heat signature. If Rink is fitted, then this option can be switched on and off.				
Game Effect: None.				

Glowderm				
Cost: 5000	Rarity: 22%	Rehab: 10 hrs	Maufacturer: Morgan	Requires: Rink
Augmentation: NBG 40hrs			Visible: EG, EM (when on)	Repair: None
Description: When switched on, the skin of the Aug glows, producing light to the surrounding area. This light can be bright enough to shine through most basic clothing. Useful for those working in darkened areas. Consciously switched on and off using a Rink.				
Game Effect: None.				

Anicosmetics				
Cost: 2000	Rarity: 11%	Rehab: 2 hrs	Maufacturer: Morgan	Requires: Rink
Augmentation: NBG 10hrs			Visible: EG	Repair: Taxing
Description: A programmable pigment is placed under the whole skin, allowing the user to change the colour of their skin quickly. Animations and cosmetic enhancement is possible but often a matter of style. New 'skins' can be downloaded into the Rink for a minor cost (from 10 to 1000).				
Game Effect: None.				

Re-Appearance				
Cost: 4 000	Rarity: 12%	Rehab: 2 hrs	Maufacturer: Uo	Requires: Nil
Augmentation: NBG 40hrs			Visible: EG	Repair: Taxing
Description: The Aug can change their facial appearance by the alteration of bone structures in the face. Only face shape is changed using this method. Skin tone and hair colour remain the same.				
Game Effect: Difficult to detect without a medical scan.				



Bioware

Introduction

Bioware is a relatively new technology. Although Star Sci have claimed that it has been in the public domain for hundreds of years, the common person would rarely meet anyone who has had any sort of Bioware augmentation. Bioware is the expensive option for those people who wish to remain human. By utilising flesh-generating technology the bioweave machine can create just about any organ within the human body, using the DNA of the Aug as a template. There are limitations to the extent of replacement: the brain and central nervous system are not replicatable yet. Given the right technology, this has taken medicine to a whole new level. Instead of generating synthetic organ replacements and adjusting them to the patient, the *Bioweave* machine can weave bio-matter like flesh together such that an almost identical (but defect free) organ can be created within the host. The largest problem with the bioware system is its rarity (94%). Very few bionics doctors are willing to go through the extensive training or buy the expensive machines. Also, bioware is not widely known about, so there is little demand for it. This drives the price up (the raw materials are expensive as well), making it less attractive. This is indicative of all new technology, though.

Bioware Classification

There are two very distinct types of Bioware. Firstly, there is **Regeneration Bioware** (Regen), which is Bioware that is replacing a faulty or missing part of the body. This can include failed hearts, collapsed lungs or missing limbs. After augmentation, the Aug is as human as they were before. Secondly, there is **Cut and Shut Bioware** (CAS). This sort of Bioware improves the Aug in some manner, altering the DNA and the physical make up. CAS bioware can improve the Aug beyond human maxima.

Augmentation

The bioweave machine is essentially part beamer, part field manipulator and part Nanobiogenetics platform. The bioweave machine deeply scans the Aug before beginning, collecting information about the DNA and physical makeup before beginning the augmentation process. Next the NBG is injected to surround the area of interest and prepare for removal. A number of delicate Grav fields and locks are set up and a new organ is created. The bioweave simultaneously beams the new organ in and then uses its field and the NBG to weave the new organ into place. This is the most complex form of Bioware augmentation, scars and such can be removed quickly by reweaving the skin from the outside and no beaming is required. Bioweave can be used for replacing any flesh parts (even the skin covering Cyber).

A new skill is required for using the Bioweave.

BIONICS: BIOWEAVE

Requires: Bionics Systems (70%). Starting: Wit Wit. This skill allows the user to use the bioweave machine to augment humans in either CAS or Regen operations. A failed roll means that the augmentation has failed and the Aug may have to either go through more surgery or have longer rehab times.

Rehabilitation

Unlike other forms of bionics, Bioware doesn't always need a rehabilitation. If a limb is replaced then



the brain will quite quickly forget that it was removed in the first place. If the Aug is to be improved beyond their original physical make up, then Rehab will be required in some form. In this case, the Rehab is nearly all supervised and can be an arduous process, Bioware is not as easy to recover from than other forms of Bionics.

Bioware Systems

Unlike Borgware and Cyberware, there are no 'suits' as such, but just a series of systems that augment the human form. The listing below is split up into the different forms of Bioware available. Essentially any part of the human form can be replaced with bioware except the brain and the upper reaches of the spinal column.

Regeneration Bioware

Skin regeneration				
Cost: 50 000 per limb	Rarity: 82%	Rehab: Nil	Manufacturer: n/a	Requires: Nil
Augmentation: Bioweave 4hrs per limb			Visible: Nil	Repair: None
Description: When skin has been damaged or burnt off, this will reweave the tissue correctly so it is undetectable as new skin. Also includes reweaving of skin over Cyberware and the removal of aging factors.				
Game Effect: The limb is returned to the skin complexion of either the current Aug or early 20s (if desirable).				

Organ regeneration				
Cost: 140 000	Rarity: 76%	Rehab: Nil	Manufacturer: n/a	Requires: Nil
Augmentation: Bioweave 2hrs per organ			Visible: Nil	Repair: None
Description: When liver, spleen, lung, eye, prostate or even heart fails, it can be rewoven and reinserted into the host without any fear of rejection as it is grown from the original DNA pattern.				
Game Effect: The organ is replaced and immediately begins working once more. This is rarely used in game, but is included for completeness.				

Limb regeneration				
Cost: 750 000 per limb	Rarity: 86%	Rehab: Nil	Manufacturer: n/a	Requires: Nil
Augmentation: Bioweave 8hrs per limb			Visible: Nil	Repair: None
Description: For those people who have lost an arm or leg, a new one can be regenerated from the original DNA. Once the limb has been woven, it may be used immediately. The only side effect is a slight tingling which will soon disappear. Not really counted as rehabilitation and does not require supervision, although the operation of dangerous machinery is not advisable while this chemical imbalance is happening.				
Game Effect: For 2 hours after the regeneration, any skill is at -10%.				



Cut and Shut Bioware

Appearance alteration				
Cost: 180 000	Rarity: 75%	Rehab: 10hrs	Manufacturer: n/a	Requires: Nil
Augmentation: Bioweave 12-20hrs			Visible: Nil	Repair: None
Description: The most common form of Bioware is the appearance alteration. This can reduce the effects of aging or change how the person looks. This is almost impossible to detect, even on medical scans.				
Game Effect: Nil				

Hypernervous system A				
Cost: 800 000	Rarity: 90%	Rehab: 16 days	Manufacturer: n/a	Requires: Nil
Augmentation: Bioweave 40 hrs (1 day)			Visible: Nil	Repair: None
Description: This upgrades the nervous system such that deficient neurons are removed from the Central Nervous System and spinal chord and connections to the brain are re-routed to provide a more efficient nervous system. Hypernervous System is not detectable.				
Game Effect: Shift + 2				

Hypernervous system B				
Cost: 1.8M	Rarity: 93%	Rehab: 18 days	Manufacturer: n/a	Requires: Nil
Augmentation: Bioweave 44 hrs (1 day, 4hrs)			Visible: Nil	Repair: None
Description: This upgrades the nervous system such that deficient neurons are removed from the Central Nervous System and spinal chord and connections to the brain are re-routed to provide a more efficient nervous system. Neural accelerators are also added to provide further acceleration. Hypernervous System is not detectable.				
Game Effect: Shift + 2, Battle + 1 (but no larger than 11)				

Precision Technique				
Cost: 1.1M	Rarity: 93%	Rehab: 23 days	Manufacturer: n/a	Requires: Nil
Augmentation: Bioweave 38 hrs			Visible: Nil	Repair: None
Description: This upgrades all the muscles and the nerves connecting them. The upshot of this is the user can move with more precision when at speed. The most practical use for this is in the use of skills where manual dexterity is required.				
Game Effect: Battle + 1 (but no larger than 11). Task Skills +20%. Design Skills +10%. Surgery 20%. Hacking +10%.				



Neurostabiliser				
Cost: 250 000	Rarity: 87%	Rehab: 12 days	Manufacturer: n/a	Requires: Nil
Augmentation: Bioweave 27 hrs			Visible: Nil	Repair: None
Description: This upgrade allows the Aug to suffer more pain and physical shock than before. The results are startling and the Aug is virtually impossible to knock unconscious.				
Game Effect: Meat + 1. Stun: 1000.				

Bioarmour				
Cost: See Below	Rarity: 89%	Rehab: 4 days	Manufacturer: n/a	Requires: Nil
Augmentation: Bioweave 40 hrs (1 day)			Visible: Nil	Repair: None
Description: Alterations to muscle tone and bone marrow leads to resistance to damage and penetration. Also, skin hardening can be used such that the dermis hardens when an impact is felt. Armour is only detectable on deep medical scans and then the results will be inconclusive to those who are not used to seeing Bioweave systems. Bioarmour comes in different types, with different statistics (given below).				
Game Effect: Armour specification is: “ <i>Name:</i> (Cost). Statistics” and then any notes. <i>Spline Plate:</i> (650k). H 15, 500. LA 15, 1200. T 15, 2000. RA 15, 1200. LL 15,1600. RL 15,1600 STUN: 300. <i>Multilayered Woven:</i> (880k) H: 35, 1200. LA: 35, 2000. T: 40, 4500. RA: 35, 2000. LL: 35, 2800. RL: 35, 2800. STUN: 350. <i>Cross Woven Protein Chain:</i> (2.2M) H: 50, 4000. LA: 50, 5600. T: 50, 8000. RA: 50, 5600. LL: 50, 6000. R: 50, 6000. STUN: 400.				



Generic Systems

Introduction

Some bionic systems can be used by more than one of the different systems. This is much the case when it comes to system designed for the Rayengine Link (Rink). In this case, there is a number of Gaia entities that can be installed to improve the user within Gaia. The generic systems are listed here much the same way as before.

Rink Systems

Rayengine Link (Rink)				
Cost: 12000	Rarity: 15%	Rehab: 40 hrs	Maufacturer: Kryotek	Requires: Nil
Augmentation: CRC + NBG, 5 hrs			Visible: EG	Repair: Hard
<p>Description: A link with a powerful Rayengine as installed in every Borg and Cyber suit. The Rink is a very useful device that can be combined with other technologies to provide the Aug with extra abilities. The Rink is a tiny Ray Engine that is linked to the brain through over 10 billion synapses. Normally, it is used to consciously store information (data) for the user but can also be used to connect with other devices. When viewing information in the Rink, the user sees it in their Mind's Eye, not overlaid onto their eyes. This requires some concentration, so retrieval of information and using of systems requires the Aug's full attention.</p> <p>The Rink comes fitted with Personal Organiser and Biosystem Overview which shows a large amount of neurological information (neurons firing) without much use. For a cost of 10 000 each, the Rink can be installed with a knowledge package. This installation can be done afterwards, but required a CRC machine (and extra cost).</p> <p>Game Effect: Knowledge Package gives the Aug a <i>Know Skill</i> in a desired subject area at 25%. This can not be increased and does not add as an additive. Limitations: You can not record off the senses. Access to the Rayengine information and processes can only be gained through the conscious thought of the Aug.</p>				

Rink Gaia Link				
Cost: 18000	Rarity: 75%	Rehab: 1 hr	Maufacturer: Kryotek	Requires: Rink
Augmentation: CRC, 1hr			Visible: Gaia, EG	Repair: Taxing
<p>Description: Access to Gaia without using a terminal. This can be done from within the mind. Eyes should be closed to allow better focus on the 'Mind's Eye'. Tends to be much quicker than the traditional method. Can not be switched off, but the user must be conscious for it to be 'on', when 'on', the user always appears on Gaia and can be hacked. The hacker may only access systems connected to the Rink, if there are no other Augmentations, then only data on the Rink may be accessed. Thus, it is considered dangerous for those with extensive Cyberware to fit this device.</p> <p>Game Effect: Link counts as immersive terminal with the following bonuses: +10% to Computer Design, +20% to Hacking, +40% when hacking against human hackers using an immersive terminal.</p>				



Rink Weapon Link				
Cost: 22 000	Rarity: 34%	Rehab: 2 hrs	Manufacturer: Napalm	Requires: Rink, Gaia Link
Augmentation: CRC, 1hr		Visible: Nil		Repair: Nil
Description: A notional link between a weapon and its user is a very useful thing to have. With this modification, the Aug can feel the weapon firing and aim with more luck. Also, the weapon can now only be fired when then Aug wishes it to be. The Aug does not need to be holding the weapon to fire unless the weapon requires it. Extra weapons may be added to the link for a cost of 220 each.				
Game Effect: Weapon must also be upgraded (Successful Weapon Systems Roll) with parts (included). All Firing Skills +15%.				

Sensory Overloader				
Cost: 130 000	Rarity: 80%	Rehab: 120 hrs (3 days)	Manufacturer: Napalm	Requires: Rink, Gaia Link, Eyes
Augmentation: CRC, 20hr		Visible: Nil		Repair: Nil
Description: This system allows one Aug to feel the senses of other Augs. This is normally done on a visual basis but can include touch, sound and smell. All Augs must be aware of the sensor overloading and the link can not be hacked or watched by a third party unless they have hacked directionly into the Rink of one of the Augs.				
Game Effect: None to effect.				

