Prodigals by Jason Leung

Introduction

Hundreds of years from now, humanity has finally broken out of the solar system to colonize other stars. A young woman, born on a distant colony world, lives through its rise and fall - from the dangers of the native ecosystem that almost claims her parents, to the teenage angst of being unsure about humanity's place in the universe, to the alien invasion that would make her world unrecognizable.

Two-thirds of a science fiction novel, written for the National Novel Writing Month online event.

Prologue

The invention of the quantum tunneling drive, formally known as the **Macroscopic Tessler-Rao Device**, was rightly considered to be one of humanity's greatest achievements by contemporary historians and the scientific community. The significance of humanity breaking through the **c-limit**, long thought to be impossible through the 20th to the first half of the 22nd century, was long heralded in popular culture as no other piece of technology has been before. The sense of expectation in society was particularly intense during the 20th century, when the **science-fiction** genre of literature was in its golden age. Despite the fact that scientific knowledge then saw faster-than-light travel as an impossibility, only the most pessimistic of futurist works predicted that humanity would not inevitably discover a method for FTL travel and begin to colonize and inhabit other planets. Therefore when the centuries-long prediction was borne true, the majority of polities and organizations were already able to anticipate the plethora of uses and implications for working FTL technology and many of these uses were quickly put into application. It is perhaps unique in the history of invention that human civilization was able to adapt to the usage of such a radical technology in so short a time.

Contemporary sources stated a large number of opinions on the invention of the Q-T drive. By the early 22nd century, the Fermi paradox has been overturned when space-based astronomical equipment became sensitive enough to receive energy emissions that provided strong evidence to the existence of organized, interstellar civilizations in the galaxy. While not accepted by all, the existence of aliens has become common knowledge by the beginning of the 23rd century, even though no

successful attempts at communication have ever been made. Both the "Alien Threat" and the "Federationist" schools of thought recommended interstellar colonization, although for different reasons. The former school argued the potential threat posed to the existence of human civilization by hostile aliens and urged spreading human influence throughout the galaxy to increase both its chances of survival and its power base against any future military conflict with alien polities. The latter school emphasized the potential gains in technology and culture from peaceful contact with alien civilizations and advocated the universal equality and brotherhood of all sophonts.

The invention of the Q-T drive in 2204 also created a massive impact on the political climate of **Sol System**. The rise of the **Jovian Alliance** had upset the longstanding trilateral power balance between Venus, Earth and Mars, the three traditional great powers that held the concentrated economic and military power of all of humanity. Devastated by the long and destructive **Solar War** (2166-2187), the three inner system powers were too weak to check the rise of polities relatively untouched by the Solar War, mainly situated in the outer Solar System. Tensions threatened to break the fragile peace and contemporary commentators feared the breaking out of another war as the Jovian Alliance chafed against inner-worlder matter extraction holdings around Jupiter and the Asteroid Belt. The invention, when it was announced and distributed through the **Trilateral Open Committee**, became the most valuable bargaining item in the inner powers' arsenal during the **Ceres Conferences** of 2206-2207. Many high-level observers saw the successful conclusion of the conferences (and the subsequent acquisition of the technology by the Jovian Alliance) as one of the major causes of the brief period of entente between the major powers until the launch of the first interstellar colony ship in 2215.

The construction of the first interstellar colony ship as a joint project between the three inner powers was preceded by the launch of a large number of small exploration vessels. These early series of vessels were sent to a selected number of star systems to examine their viability for human colonization, untended to confirm earlier astronomical data. The construction and launch of these vessels allowed scientists and engineers of the three powers to rapidly test and improve the Q-T drive, in the process also advancing spaceflight and **AI** technology by leaps and bounds. The 2-kilometer interstellar colony ship **Tranquility** was seen as the culmination of the earlier efforts, transporting 254 colonists to the Avery System, 17.4 light years from Sol. The ship made numerous return trips to ferry more colonists and supplies to the system, during the time which the Jovian Alliance launched its own interstellar colony ship, the

Titan, two years later. This began the **Second Space Race**, a heated but nonviolent competition between the major polities to claim as many exosolar worlds as possible. While the Jovian interstellar program had a later start and was relatively under-funded compared to the three-power consortium controlled by Venus, Earth and Mars, it boasted a unity of purpose and a more efficient industrial base that the politically divided consortium lacked. The intense competition between the two power blocs triggered what many called the golden age of human interstellar colonization. Many citizens from the overpopulated inner worlds entered the government-funded colonization program for a myriad of reasons. Most were self-professed romantics who could not resist the opportunity to "see different suns," a smaller proportion of colonists were members of disenfranchised groups and ethnicities who wanted to escape the oppressive political climate of the Solar System. Despite the strict screening tests the major polities put into place to ensure the creation of loyal and successful colonies, members of many notable groups were able to settle on new worlds and found coherent communities. For many, the memories of the Solar War were still fresh in their minds, and many colonists stated concerns for future security as part of their reason for participating in the colony program.

A second, distinct phase in the colonization effort emerged in the 2230s, characterized by an increase in the rate of colony ship launches and the entry of the Jovian Alliance into the three-power consortium, now official renamed the Sol Colonial Initiative. The massive scale of public funding provided to the new colonies was putting a heavy burden on the finances of the **three powers**, and a new generation of private corporations was steeping forth to finance and manage the colonization program. Technological advancement during the decade was able to drive down operation and launch costs to the point where private interest groups were able to fund their own ships and colonists. **Launch consortiums** based on ethnicity, sub-planetary nation-states and even lifestyles rose to prominence, such as the **Indian Launch** Group based around the Sri Lankan Orbital Elevator and the Noachis Foundation in Mars. Coupled with a general deregulation of interstellar travel, the colonization effort became more dynamic and less organized, while the repercussions of the establishment of the **first colonies** was still challenging the identity of human civilization in the Solar System. The initial wave settled six worlds chosen for their optimal environment and their development was heavily controlled from Sol by the three powers, while the second wave settled eleven worlds of varying quality and their efforts were generally less effective and successful. The result was a decade of widespread social discontent as the failing, second-wave colonies revived old grievances that proceeded to take root in the older, more established first-wave

colonies. Exacerbating the frictions buried by the uneasy union between the inner powers and the Jovian Alliance, the first acts of interstellar terrorism and war took place in 2232. The brief **Arcadia-Penglai War**, waged between ultra-nationalist Han terrorists and a corrupt colonial junta, sparked the first serious response from the SCI, which has been insulated from the ongoing violence by their deregulation policy. Realizing the magnitude of the problem, the organization quickly formed the **Sol Colonial Security Force** out of a long-withheld starship reserve and used the fleet to pacify the two combatants. After a long process of restoring order over the squabbling colonies, the SCI re-asserted control over both the administration of the colonies and the colonization program itself. This marked the end of the "Wild West" of interstellar colonization, adding a small dash of vibrancy to the otherwise homogenous offsystem cultures.

The third and current wave of colonization which began in the 2240's represents a maturation of both spaceflight technology and colonial politics, characterized by the SCI consolidation of control over the first- and second-wave colonies. Simultaneously, the organization again stepped up the pace of colonization so the current phase would become most ambitious phase yet, having already settled twelve worlds and planning eight more. These efforts were better-organized and better-funded compared to those in all previous waves. Entire communities were built from scratch to provide unprecedented levels of security, comfort and efficiency to the new inhabitants, and automated robots have largely taken over the physical aspects of colony construction. The costs of FTL travel continued to decrease with technological development and increasing infrastructure. It was at that point that interstellar colonization finally begun to appeal to the common citizens of Sol System, while before it was solely the release valve for malcontents and adventurous types. The old colonies have largely found working social models and their newfound vibrancy were heavily emphasized in SCI promotion campaigns back in Sol, where over ninety percent of humanity still lived. The dramatic increase in public interest in the colonies also brought a dramatic increase in private investment, finally turning the SCI from a money-leaking white elephant into a profitable enterprise that can pay for its own running costs. Freed from the government drip-feed, the full economic impact of the SCI's trade and financial apparatus made itself felt in Sol System and the colonies, creating an age of general prosperity and economic boom that, for now, shows no sign of ending.

Currently, the Q-T drive is capable traveling ten light years in less than a month, allowing many distant but suitable star systems to be settled without the prospective colony losing contact with human civilization. However, the alien energy emissions

received during the 22^{nd} century originate from a considerably longer distance and there are currently no practical means for even a FTL starship to reach their source.

- Selected from the Encyclopedia of Sol, 2265 Edition