

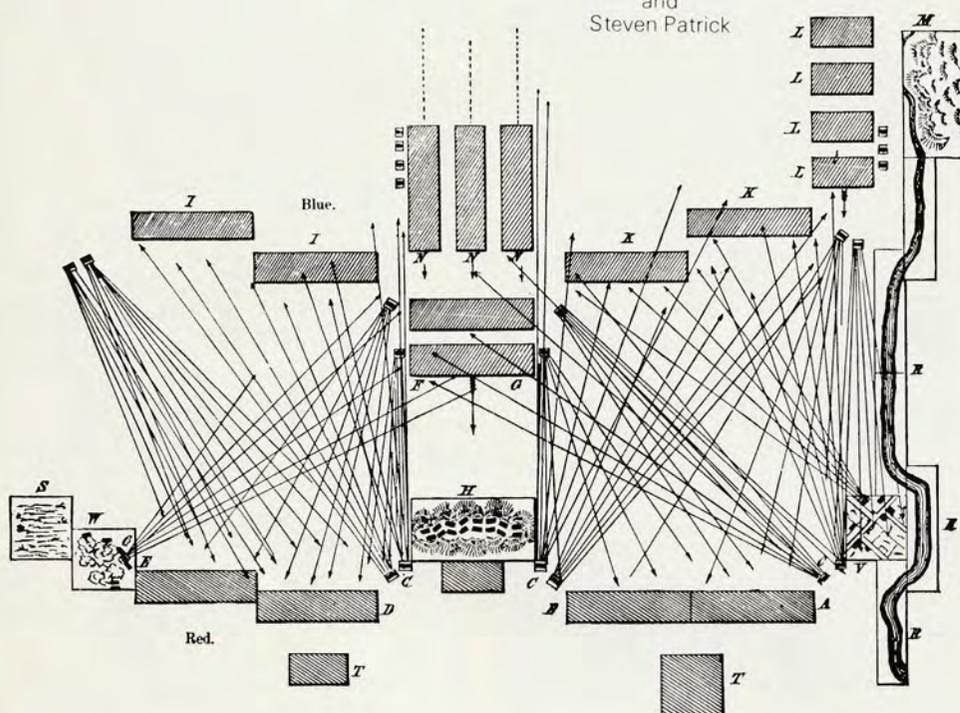
The following article, on the "History of Wargaming," is in S&T for obvious reasons. We are the only group in the field with the resources and imperative to publish such an article. The people who read S&T would [we were quite certain] find such an article of considerable interest. Having gotten those matters out of the way we should now attempt to clarify some of the ideas explicit or implicit in parts of this article. At times it may appear that we are being a bit heavy in "blowing our own horn" [for want of a better term]. But, let's face it, Simulations

Publications HAS been responsible for many of the innovations [not to mention most of the new games] produced in the past few years. To attempt to ignore this fact in the name of journalistic "fairness" [or "tradition" to be more precise] would be inaccurate, misleading and downright confusing. We like to tell people all we know. And if the "history" happens to be very close to home that's no reason to change our policy. So here it is — warts and all. Although, fortunately, we're not really old enough yet to have many warts. We hope you won't

sense any arrogance, boastfulness or whatever where none was intended. Enjoy the article and send in your feedback to let us know how you did feel about it. This article is divided into two parts. The first is pretty much "straight" history — a survey of the development of wargames from their first appearance thousands of years ago until the present. The second part is more journalism. This part of the article covers the development of the game-type you see in Strategy & Tactics magazine from the 1950's to the present.

# The History of Wargaming

by Martin Campion  
and  
Steven Patrick



An illustration from C.A.L. Totten's 19th Century American wargame *Strategos*, demonstrating the use of wooden blocks to represent a defensive action against a considerably superior enemy.

*Military* wargames, (that is, those played by professional soldiers or policy makers while on the job) can be distinguished from *civilian* wargames (that is, those published by people like Avalon Hill and Simulations Publications), in several ways. The most important distinction is purpose. While the civilian wargame is designed for entertainment and for historical interpretation, the military wargame is intended for training and for predicting possible real futures. Sometimes, the tie to the future is very explicit, with the soliders walking out from the games room to try to repeat the game results in

real battles. Other times, the purpose for playing a particular game is more general. But always, the purpose of the professional military game is to prepare for future crises.

## BACKGROUND

The roots of such wargames lie far in the past. Chess, Go, even Checkers, were once probably thought of as suitable training for war. But if Chess had ever possessed any value as a simulation, that value was long gone by the 18th Century in Europe. By then, there had been too many developments since the days when battle was a collection of single combats. However, 17th-Century and 18th-Century Europeans were possessed by a desire to understand their environment scientifically and, for that reason, several thoughtful people decided that the ancient game of Chess should be updated to make it useful once more for understanding war. Indeed, as early as 1644, one Christopher Weikmann invented what he called "The King's Game," a 31-piece development of Chess. There were many other games, with assorted pieces and rules, collectively called "Military Chess" or "War Chess" games.

However, the first game that went far beyond its chess origin was a game invented in 1780 by Helwig, Master of the Pages for the Duke of Brunswick. Helwig's game was played on a board of 1666 squares. The squares were colored in different ways to represent different kinds of terrain and also contained numbers which represented smaller terrain features. Each army defended a fortress and the game was won by capturing the enemy fortress. Helwig added something new by providing that his pawns represent units of men rather than single individuals. Each side was given 120 fighting units, including infantry, cavalry, and artillery as well as some pontoons and 200 entrenchment counters. The rules provided for specialist pieces like pontoniers. The moves were: infantry 8 spaces, heavy cavalry 12 spaces, and light cavalry 16 spaces. Helwig's game became quite well known and was introduced throughout Western Europe.

A more complex type of game but on the same basic principles was developed in 1795 by Georg Vinturinus, a military writer in Schleswig. Then in 1798, Vinturinus adapted his game to a new board — one based on an actual area, the border between France and Belgium, one of the most fought over areas in Europe since the 17th Century. The board had 3600 squares. In addition to the fighting units, there were a large number of different military stores and devices to keep track of: siege equipment, fortification, bridges, bread. In accordance with the 18th-Century idea of the importance of lines of communication, armies were required to maintain a line to their bases.

None of these early games had any particular value as aids to military training. They were like the historical board wargame of present — useful to visualize military concepts, excellent as entertainment for those with the time and patience to understand their rules, but not much of a preparation for actual military experience.

A Prussian father and his son were the inventors of a series of games that won the respect of some Prussian officials and started the wargame to its place as a mainstay of military training in the 19th Century. The father, Herr von Reisswitz, was a civilian who first developed his game in the dark years of

Napoleonic domination in Germany after the Prussian defeat at Jena. He moved toward greater realism by dispensing with a grid pattern for movement and by using a sand table to represent terrain. Furthermore he adopted a particular scale (1:2373) and attempted to bring everything into harmony with that scale, including the sizes of the unit counters — blocks of wood with military symbols pasted on. In 1811, Reisswitz's game was shown to two young Prussian princes who arranged an interview with the King. For that occasion, Reisswitz made a deluxe version with plaster terrain and porcelain units. This game became a constant plaything at the Prussian court and from there it spread to the Russian court. But it was not used by soldiers until Reisswitz's son took an interest in it.

## THE RISE OF MILITARY WARGAMES

The younger Reisswitz was a first lieutenant in the Prussian Army in 1824, when he began to experiment with his father's game. First he transferred the game to realistic military maps with a scale of 1:8000. He published a set of rules in 1824 and supplements in 1825 and 1828. Meanwhile, he had impressed some of the highest officers in the army with the usefulness of the game. In 1824, the game was played for General von Muffling, then Chief of Staff. Muffling was quite skeptical but consented to witness a demonstration and was thereby converted. "It is not a game at all!" he exclaimed, "It's a training for war! I shall recommend it most emphatically to the whole army." And he did. Each regiment was furnished with a set and officially urged to practice on it.

The game developed by the younger Reisswitz was more realistic in several ways than earlier games. The terrain was represented on terrain maps drawn exactly as real military maps would be drawn. The players on opposite sides were not allowed to see the actual situation on the map. Instead, the services of an umpire were required to keep track of the situation on his map and to tell the players what they could see or what their patrols could discover. A time scale was accurately maintained with each move equal to two minutes in real time. The tables furnished with the game provided for movements in this time period. Each play of the game could be different because it was made up by the umpire or someone else outside the game. The opposing players were given the same information on the general situation but were given different special tasks to accomplish and different forces to use. The special information also included limited information on enemy forces and possible missions. For each move, written orders were given to the umpire, who harmonized them and reported back the discoveries of troops on the move. However, the individual players were represented on the map and discoveries were not reported to them until a messenger had had time to reach them. Each side could be represented by a team instead of a single player and then players on the same side could not communicate directly with each other unless they were close on the map. When the two sides clashed, the umpire determined losses by throwing dice and consulting an odds table.

Reisswitz's game was enthusiastically recommended by the Prussian Chief of Staff but that did not make it popular among very many of the officers, nor did that make its inventor popular. He was transferred to the boondocks by jealous senior officers and harped at for

inaccuracies in his game by most of those who played it. Consequently, he became despondent and committed suicide in 1827.

However, the game had its fans in the Prussian army. One of them, as early as 1828, was Lieutenant Helmuth von Moltke, future Chief of Staff and victor in two wars. Enthusiastic players combined to form a wargames club, the *Kriegsspieler Verein* and to publish the first wargaming periodical. All of the wargame's devoted players changed the game as they played it. Several Prussian officers published their own sets of rules in attempts to make the game more realistic. The general tendency was to loosen the rigidity of the rules and to increase the responsibility of the umpire. Many changes were made, particularly in the computation of losses, which was felt to be quite rigid and arbitrary in Reisswitz's original game. The normal method came to be a standard and multiplier system. The casualties resulting from some simple situation were figured out and became the "standard." Then the percentage change resulting from different circumstances was used to vary the standard. There would be a different multiplier for each circumstance that differed from the standard circumstance. This system made the game more realistic but also more tedious as many multiplications had to be made to figure losses. Still, the game was thought to be both too detailed and too unrealistic by most officers. However, it became more popular when Moltke pushed it from the top after becoming Chief of Staff in 1837.

## FREE KRIEGSPIEL OPPOSES RIGID KRIEGSPIEL

In 1876, Colonel von Verdy du Vernois, leading military writer and instructor, expressed the dissatisfaction of many officers by calling for the simplification of wargames. Basically, Verdy advised that most of the rules and the dice be thrown out but that the basic idea of the game be retained under the direction of an umpire experienced in actual warfare. Of course, by this time, Germany had been victorious in the Seven Weeks War and the Franco-Prussian War and had many experienced officers. In effect, then, the umpire would make up the rules and apply them as he went along and the players would have the freedom to attempt things that might or might not be allowed by the umpire. Aside from the new importance given the umpire, Verdy's game was played like the other kind. The situation was variable, the players were separated and given only the information they could legitimately possess. A few standards were adopted as a basis for movement. For example, a battalion in line formation occupied a front of 200 yards, and fresh infantry could march on good roads at a speed of 117 yards per minute. But it was up to the umpire to make any changes in these standards due to the exhaustion of the men represented or the badness of the weather and roads.

The suggestion of Verdy du Vernois led to a division among wargamers among those favoring the changed game — called free Kriegsspiel — and those favoring the traditional game — called rigid Kriegsspiel. Both versions could be applied to any size game, but the complexity of the calculations necessary for the rigid game usually limited it to the representation of companies and battalions. In both forms it became a mainstay of training not only in the German army but in most armies of the world.

The Germans impressed the whole military world in 1870, with their victory over the French, previously considered to be the best soldiers in the world. As a sign of German ascendancy, many armies, including the American, abandoned their French-style headgear, the *képi*, the cap worn by Union soldiers in the Civil War, and adopted the Prussian-style spiked helmet. More importantly, they investigated and adopted German staff procedures, German organization and German training methods. Along with everything else came the German *Kriegsspiel*. Apparently, foreign soldiers gave wargaming more credit for the German victories than it actually deserved. But with the availability of Free *Kriegsspiel* and with the period of tense peacefulness between 1871 and 1914, all armies including the German made wargaming a more important part of their training program.

In England, for example, wargames were introduced with the publication, by the War Office, of a game called *Aldershot*, a rigid Reisswitz-type game. In 1883, the commander in chief, the Duke of Cambridge, issued official orders recommending wargaming and in 1896, a set of rules were published in a service journal. In England, wargames were often played on military maps of England and arranged so that the climax of the encounter would be in an area near the post where the game was being played.

The Italian army favored rigid *Kriegsspiel* and made its play an important part of the course at the War College. Forty evenings were spent learning the game and various versions were played over a two year period. It was intended mainly to instruct in logistics and other staff work. In the French army — the defeated army in 1870 — there was some interest in wargaming, but the French were much slower in adopting this device than other soldiers and it was not widespread until after 1900.

The Russian and the Japanese armies both used wargaming but it was accepted less enthusiastically by the Russians who tended to feel that it was not worth the bother. When the Japanese defeated the Russians in the Russo-Japanese War of 1904, the Japanese gave much of the credit for their victory to their play of wargames, while the Russians turned to them with a new interest.

Rigid *Kriegsspiel* was introduced into the American army in 1867 through the translation of a German work. It spread slowly but inspired two American officers who independently devised their own games by the 1880's. Major William R. Livermore published *The American Kriegsspiel, A Game for Practicing the Art of War Upon a Topographical Map* in 1882. Livermore's major contribution was to recommend a series of devices to cut down on the paper work involved in playing a rigid *Kriegsspiel*. The unit counters were marked on four sides with stripes and dots to represent strength. Other blocks, called "counters," were provided to be placed in front of troop units to show fatigue. Other blocks, called "checks," were used to show disorganization following a battle. Assorted pointers, called "indices" were to be placed on the map to show firing and movement. Computations of the effects of fire were supposedly simplified by a "Firing Board," a pegboard used to keep track of time and to help the figuring of casualties by the movement of pegs in the holes.

At about the same time, Lieutenant Charles A.L. Totten was working on his game, published as *Strategos: A Series of American Games of War* in 1880. Totten's game is distinguished by his attempt to appeal to the amateur as well as the professional. He provided a highly complex game like Livermore's but he also provided a basic game, called "The Battle Game," which used a square grid map to simplify movement.

Because of the difficulty and inconvenience of Livermore's and Totten's games, they met the same resistance in the American army that other rigid *Kriegsspiel* rules had overseas. Livermore attempted to disarm some criticism by recommending that the umpire disregard the charts and estimate movement and fire effect whenever possible. Free *Kriegsspiel*, based on the work of Verdy du Vernois, was also introduced into the United States but was itself criticized. Several officers argued that free *Kriegsspiel* replaced arbitrary written rules with even more arbitrary unwritten rules and that few men had the authority to be an umpire under such a system. By the end of the century, there seemed to be a tendency for the two systems to coalesce into one, becoming semi-rigid (or semi-free) *Kriegsspiel*. Officers who advocated free *Kriegsspiel* were found on occasion to be consulting charts and rules, while Livermore, identified with the rigid game, was reported to disregard his own tables and charts as often as he consulted them.

After 1900, discussion and invention of wargames continued in the armies of the world. Generally, since there were few new experiences (and since experiences like the Russo-Japanese War were generally misunderstood), there were few changes in wargaming. Books published by German Captain Frederick Immanuel in 1907 and by American Major Farrand Sayre in 1908 were among the best contributions to the discussion. Immanuel was in the free *Kriegsspiel* tradition. He vigorously preached the doctrine of flexibility and all power to the umpire. Nevertheless, with the problems of the beginning umpire in mind, he did give some recommended distances for movement, based on a move interval of 2½ minutes. Infantry, on roads, would move 1,000 meters in 12 minutes. Cavalry and Field Artillery would walk 1,000 meters in 10 minutes but gallop the same distance in only 2½ minutes. He also provided a table for deployment. An infantry battalion would deploy in 5 minutes, a regiment in 15, and a brigade in 30. Immanuel recommended several ways for making the game faster, more interesting and, therefore, more instructive. Unimportant skirmishes could be ignored, preliminary maneuvering could be eliminated, or extra information could be given out in order to bring the opposing forces together faster.

Sayre's game was more in the rigid *Kriegsspiel* tradition but he too advocated flexibility. Thus the major difference between his book and Immanuel's was that Sayre supplied a table for calculating fire results as well as a table of march distances. Under good conditions and over long distances, infantry moved at 81 yards per minute and to 110 yards per minute. Several factors could lessen the possible speed. Sayre made a good provision for easing the figuring of casualties in fire fights. By using multiples of approximate logarithms, the painful process of multiple multiplications could be changed to the faster process of addition. For rifle fire, the table took account of the following variables: in regard to the troops firing, effectiveness could be changed by two

possible rates of fire, three positions of firing, three degrees of skill, freshness or fatigue, three levels of morale, and according to the amount of fire being received; and in regard to the target troops, the variables were four angles of front, five amounts of motion, ten formations, and seven positions. These variables are numerous but fewer than those provided by Livermore or Totten and more easily if less accurately handled.

## STRATEGIC WARGAMES

The late 19th Century also saw the growth of strategic wargaming among all the world's armies. Generals were having to plan for more and more men armed with more and more sophisticated weapons and travelling by railroad. The French disaster in 1870 showed the necessity of a smooth-working plan for mobilization and movement, and the situation grew in complexity every year after 1870. The generals would have preferred plans that had proved their usefulness, but this could never be done in the real world except through war, and by then it would be too late. So the generals turned to games to prove their designs. Since the matter was so complex, these always were based on the free *Kriegsspiel* approach rather than the rigid.

The Germans, as usual, were in the lead. One of the most avid wargamers in the world at the time was the Chief of the German General Staff from 1892 to 1906, Alfred Graf von Schlieffen. Schlieffen relied on the results of extensive wargaming to develop and revise his plan — essentially the same plan with which the Germans entered World War I. However the games used to test the Schlieffen plan were no better than the ideas which went into them and were not able to point out its faults. The whole design assumed that the Belgians would not fight seriously, that the British would not land in force, and that the French would be incapable of transferring men from the right flank to the left. The games then also showed these things. Nevertheless, in the actual campaign in 1914, all of these unplanned things happened and the opening campaign ended in a stalemate instead of the absolute decision that the German generals had hoped for.

The Russian wargames were never as systematic as the German, but they did get a potentially valuable piece of information from one. In April 1914, they played a wargame on their invasion of East Prussia, an action they had promised the French to perform soon after the declaration of war. In the game the Russian armies were commanded by the two men who would command them in case of war, Rennenkampf and Samsonov. The game showed that the two Russian armies were separated because of the terrain, and were subject to defeat in detail. This was a valuable lesson but it was not applied. Later that year, when the actual campaign was attempted, the original plans were used, the two armies were still separated, and were defeated in detail at the Battles of Tannenberg and the Masurian Lakes.

In contrast, the British were able to learn from a game they played in 1905. They played a German invasion of Belgium opposed by the Belgians and by a British Expeditionary Force. The game demonstrated an important lack in British preparations for such a war: there would not be enough transport available on the outbreak of the war to move the British army fast enough to help the Belgians. The

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### A NINETEENTH-CENTURY WARGAME: THE AMERICAN KRIEGSSPIEL

After several years of wargaming experience, Major William R. Livermore published his book, *The American Kriegsspiel: A Game for Practicing the Art of War upon a Topographical Map* in 1882. In order to play the game, one also needed a set of the equipment, including assorted blocks to represent the troops, other kinds of blocks used to indicate the condition of the troops, a set of pointers, called indices or arrows, which were used to represent the actions of the troops on the board, a firing board (rather resembling an oversized cribbage board with each hole labeled to compute firing results, keep track of time, etc.), dummy clocks to keep track of the hours and minutes of game time, and a pair of dice. The book contained the rules that had been developed over a period of time by Livermore and his playing associates, with a great deal of influence from German authorities. It was published in two volumes, the first containing the text and the second containing the plates and charts. The charts contain all the information necessary to the game but are so thoroughly abbreviated that they are incomprehensible without a thorough reading of the text. The American Kriegsspiel enjoyed a good reputation in the American army for years after its first publication and was even revised to take account of new weapons in 1898. It is an excellent example of a late 19th Century rigid Kriegsspiel.

The game could be played on any size map but the troop blocks were designed to be used on a map of 1:5,000 scale (about 1 foot to the mile) with contour lines for every 10 feet of elevation. There were many sizes and types of troop blocks to represent nearly any formation. The normal unit was a company of 64 men which occupied 160 yards in skirmish formation.

The game could be played by as few as two people, but preferably there were at least three, so that one could act as umpire. Normally there were three teams, one for each side and one to umpire. The preparation for a game would begin several days in advance when the head umpire would invent a situation, a "scenario" in current parlance, and give it to the commanders in chief of the two sides. The statement of the situation was in two parts: the "General Idea" included information known to both sides about the campaign, previous events in the war, the weather, etc.; the "Special Idea" was information known to one side only and included the exact number of friendly forces involved and their mission, that is, their orders from higher headquarters, and an estimate of enemy forces opposing and their possible mission (this might not be very accurate). Livermore encouraged wide freedom in drawing up of situations.

The two teams drew up preliminary dispositions and plans and gave them to the umpire before the game began. Then on the day of the game they would meet in the game room or rooms. It was best if three maps could be used, one for each team and one for the umpire. However,

several devices were suggested if it was necessary to use fewer maps. The main point was to prevent any participant from learning something he couldn't legitimately learn. Each participant was represented by a counter on the map and parts of the map that he could not know about were covered when he approached it. The same principle resulted in strictures against talking. All communication among the players on the same side took place in writing through the umpire. He would collect messages, figure out how long it would take to have the message delivered and give it to its recipient then.

The charts for movement and firing were all figured for one minute segments, but the umpire would announce a movement segment of any length that seemed appropriate. The players then indicated their intentions by laying the various indicators on the map. The umpire then determined whether all the proposed movements and firings were possible. If they were, he proceeded to conduct them, moving both sides simultaneously. As he did so, he asked the players any questions necessary to discover their intentions in crises. Any discoveries made by the troops on the board were reported to the players, after a suitable delay for the time it took a messenger to get to the player's place on the map. Modifications of the moves might also be made as a result of new information arriving part way through a move.

When the umpires decided that a fire fight would develop, they stopped movement while they computed the effects of fire. This could be a very complex process. The number of casualties was first found by a process of multiplication. This was simplified somewhat by the use of pegs on the firing board, but it will be better here to just look at the underlying multiplication process. First, there was a "standard" firing situation. For infantry, the standard was a company of 64 average, fresh men, with breech-loading rifles, in skirmishing formation, firing 6 rounds per minute, at a similar line of infantry lying down at a known range at right angles to the firing company, returning equal fire. The standard itself varied according to the range. At 500 yards, the casualties of those receiving this kind of fire would be .45 men per minute, at 100 yards, 1.5 men per minute, etc. But the standard seldom prevailed. Each of the factors could be varied by a multiplier, and the standard multiplied by all the multipliers gave the actual casualties. The troops firing could be differently disposed: if they were on horseback, the multiplier was .12; if they were lying down behind a log, it was 1.2; if they were moving forward, .60; if they were not rested, there were various changes; etc. Or, there could be many differences in relationship between the firers and the target troops, including differences in angle of front, elevation, movement, and amount of fire coming the other way. Or, the troops receiving fire might be in a different formation, or behind fortifications (if they were behind a trench, the multiplier was .25). Several other things could be taken into account, but this will suffice. Finally, all this gave only the minimum loss. As the last

step, a die was thrown and a good number would increase enemy casualties. All fire, including artillery fire, was computed in a similar fashion.

After casualties were computed, there might arise some question about the stability of a unit. There were a large number of factors that could determine whether a unit would disperse or continue to stand so this computation was also made by a standard and multiplier system and determined finally by a throw of dice.

The next step was to figure further movement. With movement there were fewer factors to be taken into account than with firing and the computation was much simpler. A few examples from the table are: infantry could move over good road at 44 yards per minute and over hard pasture at 40 yards per minute, but their speed went down to 10 yards per minute going through marsh mud. They could be double time but that would result in fatigue counters being placed by them involving penalties for firing, or further movement.

A movement might be a charge resulting in a melee. The chances for success of the charge were computed first. The umpire used another standard and multiplier system which took account of such things as the slope up or down which the charge was made and the previous success of the units in question. The dice were thrown to determine the victory and the length of the melee and then the results of the charge were computed. The number of casualties on both sides was a product of the length of the melee, but there was a chance of pursuit and if that took place, the losses mounted rapidly.

Finally there might be other kinds of activity going on which the umpire would check at intervals of 10 minutes, game time. Engineers or other troops could be set to work building bridges or fortifications or improving the defenses of villages, etc. For example, it took 16 workmen per 2½ yards 30 minutes to build a barricade across a village street. Then troops behind the barricade would enjoy a protection multiplier of .12 from rifle fire but would be still quite vulnerable to artillery fire.

This brief description can still barely suggest the complexity of Livermore's game. All the various factors, multipliers, standards, etc., were contained in 11 highly compressed tables for easy reference. What may have saved the game as it was actually played was this injunction from the author: "it cannot be too strongly stated that all these computations not only need not, but must not, be made in every case... they are intended to facilitate and hasten the game and should not be so perverted as to retard it." Livermore also cautioned his readers against regarding the game as primarily competitive. Its purpose, he argued, was instructive and the umpire should bring it to an end when its purpose was served rather than waiting to see which side "won." The best part of the game was supposed to be the post mortem during which the lessons learned were driven home by free discussion among the participants.

Totten's Strategoes had several different levels of complexity. This illustration is of the highly stylized "Battle Game," in which forces moved and fought in rigid, chess-like patterns. The action shown represents two corps of 47,000 men [each composed of three infantry divisions, a cavalry division, corps troops and baggage trains] drawn up for battle "on a level plain devoid of natural supports."

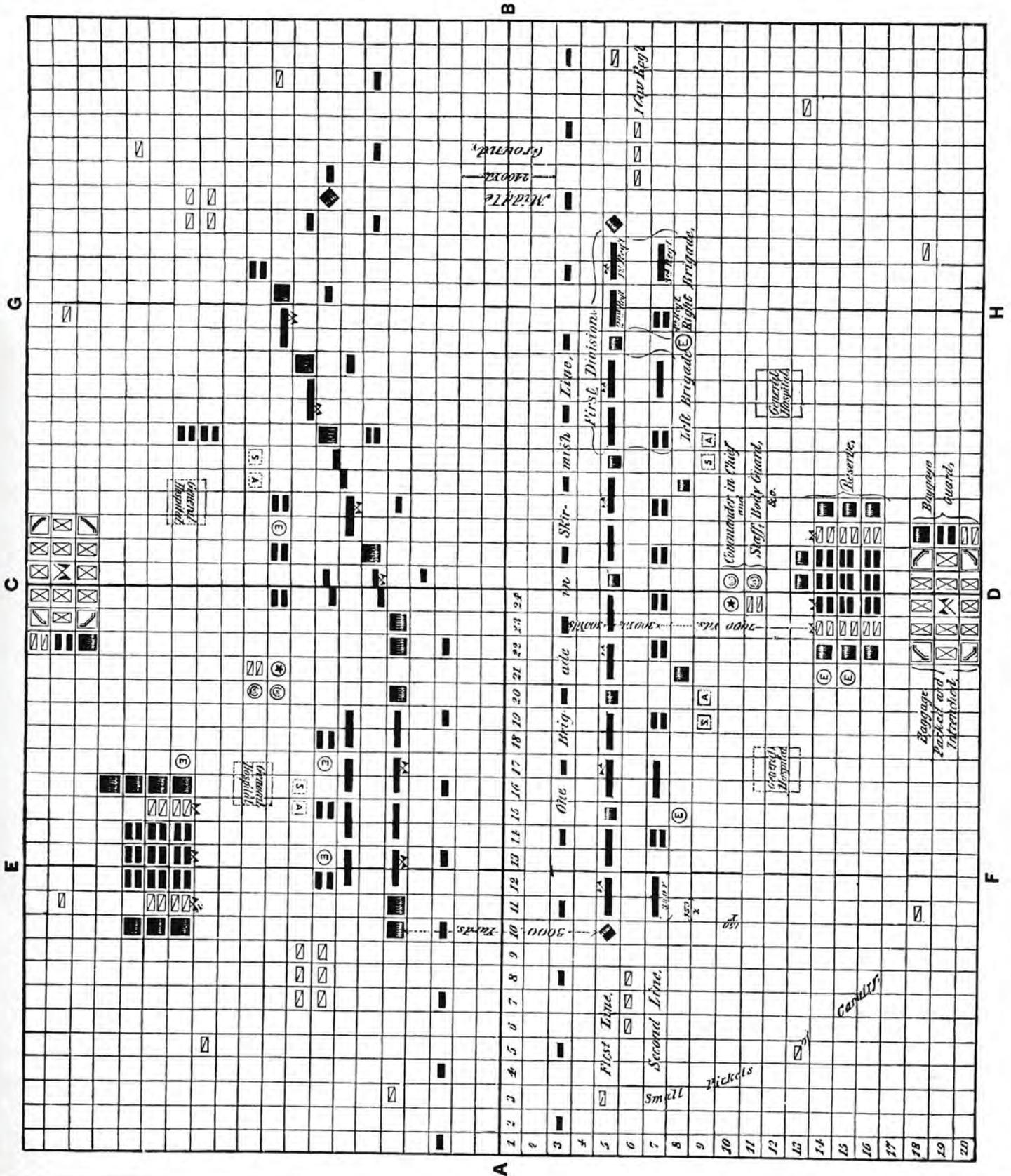
Each corps is deployed in a somewhat different fashion, the right hand one being in regular line of battle while the

other has "denied" its left flank. Otherwise, however, their deployments are nearly identical. Each has three divisions in line, but with one brigade of each detached. The three detached brigades are deployed, one in a skirmish line and two held in reserve, along with most of the cavalry and some artillery.

Solid black counters represent half-regiments of infantry (in some cases being adjacent to represent whole regiments). Cavalry is represented by squadron-sized pieces bearing what has become the modern conven-

tional sign. Artillery batteries (each of six guns) are represented by black pieces with guns printed on them. Flags represent regimental, brigade and divisional headquarters, while the various round and square counters with letters on them represent miscellaneous troops such as signals, engineers, and general staffs.

Several batteries are scattered among the front line troops. In the far rear is the corps baggage train with a small guard.





## NAVAL WARGAMING

Naval wargaming presumably began just before 1790, for in that year John Clerk published *An Essay on Naval Tactics* in Edinburgh. The remarkable thing about this book was that John Clerk was a civilian who had never been to sea and who worked out his ideas on tactics with "small models of ships which, when disposed in proper arrangement, gave most correct representation of hostile fleets." Clerk's experiences, however, did not begin a tradition of naval wargaming.

The continuous history of naval wargaming began after the Prussian land warfare *Kriegsspiel* had captured the leading soldiers of the world. Then the admirals began to think of using the same device. They had an even more difficult problem than the soldiers because the weapons of naval warfare changed even more rapidly in the 19th Century than the weapons of land warfare. Furthermore, there was even less hard experience on which to base expectations for a new war. It was not until the Russo-Japanese War that many of the new weapons and ideas were tested in actual warfare. Meanwhile, there were games. Captain Philip Colomb of the Royal Navy invented "The Duel" around 1878. It had that name because it pitted a single ship against another single ship. The vessels used guns, greatly improved in the century, and torpedoes, which were entirely new weapons.

The world center of naval wargaming since the 1890's has been the United States, particularly the United States Naval War College at Newport, R.I. The guiding genius of the early years was Lieutenant (later, Captain) William McCartney Little, who was on the staff of the War College from 1887 to 1915. He was inspired by the Prussian rigid *Kriegsspiel* and consulted with Major William R. Livermore, a leading expert in land wargaming and author of *The American Kriegsspiel*. One of the first games was a tactical game played on a 10 foot by 10 foot board, using a scale of 10 inches to the mile, and manipulating wooden and metal ship models. Later, a room was provided with a large checkerboard tile floor and the game was played on that with a scale of 8 inches to the mile. The games could involve fleets of battleships, destroyers, even submarines and land forts. In 1900, an amphibious landing game was developed.

The War College also saw the playing of strategic naval games. These were played by fleets over greater distances than in the tactical game and used regular naval charts. As in land *Kriegsspiel* games, the two sides were separated in different rooms and allowed only an imperfect knowledge of the real situation which appeared in its entirety on the umpire's chart in a third room. In making their moves, the players drew on celluloid overlays. The umpire placed the overlays on his chart and could

see the situation at a glance. When opposing fleets sighted each other, the game could be transferred to the checker-board room for a tactical continuation. Because of the difference between naval warfare, which is fought with machines, and land warfare, where individual men are the ultimate units, naval wargaming did not evolve away from rigid rules systems in the way that land wargaming did.

Since 1900, the United States Navy has been using wargames to aid its planning for war. Games have been responsible for developments of tactical doctrine, for changes in logistical planning and for the adoption of wartime strategic plans. In 1923, Admiral Sims wrote, "The principles of the war game constitute the back-bone of our profession." Wargames played from 1919 to 1941 were particularly important, for in that period one of the major tasks was to experiment with a naval war against Japan. After the war, Admiral Nimitz maintained, "The war with Japan had been re-enacted in the game rooms... by so many people and in so many different ways that nothing that happened during the war was a surprise... absolutely nothing except the Kamikaze tactics toward the end of the war; we had not visualized those."

However, the Japanese were also playing wargames during this period. In 1940, they set up the Total War Research Institute in Tokyo. There, Japanese naval, air and army officers and foreign service officers played wide-ranging games to help determine future Japanese policy and plans. The games resulted in the development of detailed war plans for the war that began in December, 1941. In August, 1941, other games were played at the War College in Tokyo which led to the adoption of the Pearl Harbor attack plan. The game showed the need for a new kind of torpedo stabilization to get shallow running torpedoes. The new system was developed just one month before the attack.

In May, 1942, the plans resulting from earlier games had been accomplished, new plans had been drawn up, and Admiral Yamamoto conducted a new series of games on his flagship, the *Yamato*. The new plans to be tested in these games called for the conquest of Midway Island, of the Aleutians, an advance between Australia and Hawaii, and finally an attack on Hawaii. Some of the more realistic men present began to have doubts immediately, although the games showed the Japanese forces taking all of their objectives without the least hitch. However, this was mostly due to the aggressive gamesmanship of Admiral Ugaki, who freely and frequently interfered in the umpiring of the game. At one point, the umpire ruled that enemy aircraft had sunk two carriers, *Akagi* and *Kaga*. Admiral Ugaki stepped in and brought the *Akagi* back to the surface. This

was not so bad, however, for later, in operations against New Caledonia and the Fiji Islands, even the *Kaga* was miraculously rescued from the bottom of the sea to participate in the new campaign. In this fashion the reckless and ill-considered Midway plan was forced through a wargaming process, which proved nothing except the blind faith of the planners. The next month, the plan was carried out unchanged and ended in the sinking of four Japanese fleet carriers, including the *Akagi* and the *Kaga*. Admiral Ugaki was unable to repeat his miracles in real life.

After World War II, the United States Navy, if anything, increased its commitment to wargaming. Once more, there was a period of rapid change in weapons, as the battleship declined and, in rapid succession jet aircraft, nuclear power, and many kinds of missiles arrived. In keeping with the complexity of the new age, current naval wargames are played with a fantastic system called the Navy Electronic Warfare Simulator (NEWS). The idea for NEWS was accepted in 1945 but it was not until 1958 that it was fully ready. It is located on three floors of one wing of Sims Hall at the Naval War College. It has over 4,000 miles of wire and 13,000 electronic tubes and cost around \$10 million.

By now, NEWS is a little old but it still offers unusual facilities for the wargamer. It is not just a computer but a computer plugged into a complex communications system. The center of the gaming is the umpiring room which is dominated by a 15 foot by 15 foot translucent plexiglas screen. This shows the location of up to 48 different forces by means of optical projectors. Other things can be shown with fluorescent pictures or chalk. The screen can represent an area as small as 40 miles by 40 miles or as large as 4,000 miles by 4,000 miles. Ordinarily the movement of forces on the screen is controlled by players who are located in up to 20 command centers, 10 to a side, or in one of the two command headquarters. Each of these is a separate room appointed to represent a naval vessel command room or a war room on shore. All of the rooms on each side can be interconnected by telephone, radio and teletype and all of the rooms are connected in several ways to the umpiring room and equipment. NEWS is very flexible. Each force on the screen can represent anything from a single aircraft or ship to a small fleet of ships. When the two sides come into action against each other, a computer that has been programmed for the particular type of weapons represented is ordinarily used to assess damage. NEWS has been used not only to play games on the premises but also as a communications and umpiring center for "remote-control" games played with actual working headquarters and bases as the games players.

(continued from page 7)

game led to the increase of transportation preparations and also led the British army to begin unofficial staff talks with the French army, a trend that helped to bring Britain into the war and to make its entry effective in 1914.

After World War I, strategic wargames continued to be relied on by the general staffs. The German army added something important to the wargaming tradition in 1929. This was during the period of the 100,000 man German army and Germany had to depend more on moral force than physical force for defense. So, following a suggestion from Manstein, the game began with a period of tension between Germany and Poland — Poland was the aggressor — and included the reactions of Britain, France, and the League of Nations, as well as military operations, first against Polish irregular forces and then against the invading Polish army.

Another game that had no issue in reality was played in 1938. As a part of an effort to prevent Hitler from starting a war between Germany and Czechoslovakia, General Beck, the army Chief of Staff, conducted a wargame. The game demonstrated that the German army could only win over Czechoslovakia at prohibitive cost and with disastrous long term results. Thanks to the Munich agreement, there was never any reality to compare with the results of the game.

Most of the German wargames of the Hitler period were strictly military and generally proved trustworthy in the narrow military sphere. All of the German army's better prepared attacks were thoroughly wargamed before the fact. During the so-called "phony war," the Germans carried out a particularly important game that showed that the march through the Ardennes could be made fast enough to surprise the French. In the event, the march was finished in even less time than had been planned. Later in the year, games on Operation Sea Lion showed the many difficulties in the way of the proposed invasion of Great Britain and contributed to the reluctance of the Germans to actually carry it out. Then Operation Barbarossa, the plan for the invasion of Russia, was the subject of and the result of extensive wargaming, which contributed greatly to the speed and success of the first few weeks' battles.

One of the most remarkable German wargames began on November 2, 1944. The staff of the 5th Panzer Army defending Germany against the Western Allies anticipated an expected American attack on their front by wargaming it. Part way through the game, the Americans actually launched the assault. Army group commander Model ordered that the game be continued. Information from the front lines was fed into the game and the defensive orders for the game were sent to the front for application in the real battle.

## WAR GAMES SINCE WORLD WAR II

Since 1945, every kind of traditional wargame has been played by the armies, navies, and civilian military planners of the world. Furthermore, there has been a revolution in wargaming that can only be sketched here.

As in previous periods, there has been a rapid technological revolution in military hardware

since World War II. Furthermore, one large class of weapons — nuclear missile weapons — has never been tested in any trustworthy fashion. But even with more conventional weapons, the wars that have been fought have given very lopsided experience with the use and combination of weapons. So military men have continued to play games in an attempt to ponder the imponderable. Naturally, the wargaming world itself has participated in the technological revolution.

Because of the new technology, there has been a definite reversal of the trend toward free Kriegsspiel, which was predominant from 1900 to 1945. High-level wargamers have large funds at their disposal and use a wide variety of calculators, computers, and sophisticated electronic communications equipment in their business.

One of the more traditional games is that played in the Marine Corps, called the Landing Force Game. It can be played with any number of situations or scenarios. It is a rigid game with a set of rules that fills two thick volumes. Although it uses an electronic random number generator instead of a pair of dice, it is still very close to the late-19th Century rigid Kriegsspiel and it takes about four months of real time to play 30 hours of game time. Other contemporary games are only a short step away from the traditional since men still make the decisions although computers are used to calculate movement and the effects of combat. These games proceed much more rapidly than the rigid non-computer games but operate on the same principals.

However, some games now are played entirely by computer. The all-computer game is extremely rigid since rules for every possibility have to be fed into the computer before a game can begin. The advantage of the all-computer game is that it can be played many times in succession, with minor variations. Thus the designers of these games, or *models*, can try to use them to discriminate between competing strategies or weapons systems.

The United States has become the center of wargaming and the U.S. defense establishment has witnessed the playing of games on every possible defense subject with its varied arsenal of gaming techniques. Foreign policy crises have been gamed in attempts to guess how the armed forces might become involved. More straightforward military actions are also gamed, but these too might have non-military complications. One of the most active areas of gaming is that of nuclear exchanges. Generally, games are used for research in areas that cannot easily be penetrated by other methods and for the training of people in crisis thinking, both political and military. The subjects of such games range from the immediate future to the possible worlds of 1984.

There is a vigorous debate in and out of the defense structure about whether all this wargaming is worth the cost and effort put into it. The more traditional wargame has probably proved its usefulness in its limited sphere but there may be some danger in the extension of the game idea to matters of general foreign and military policy. Frequently the only reason that planners continue to play games is not that they trust games to give them legitimate answers to their problems, but that they cannot think of any way to get such answers. Maybe, they hope, next year's games will be better.

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— Martin Campion

## PART II

The companion article to this relates the development of wargames as a training device for the military such as map exercises and as a mind-sharpening concept, such as in Chess or Go. These games are the forerunners of the ones seen in *S&T*. The growth of published games, such as *Monopoly*, did not see a comparative effort to create wargames for general consumption. Parker Brothers did publish *Camelot* but without any effect as far as opening up the wargame field. There seemed to be an idea, lasting into the post-World War II Period, that an intelligent wargame was strictly the prerogative of military minds. Despite the fact that World War II had held the interest of everyone down to children, no serious effort was made to exploit this interest by putting out a serious wargame.

Modern wargaming on boards, as a hobby, can be traced to one man and one game. In 1953, Charles S. Roberts, a young man in his early twenties, combined an interest in the military and in history to produce a game, which he designed in his spare time, called *Tactics*. It dealt with two hypothetical countries, each of which had an army of the post-World War II type. The game was printed commercially, although not done on oil cloth as myth would have it. It was distributed through the Stackpole Company of Pennsylvania, a company better known as the publisher of books on military science. This was only a part-time pursuit for Roberts at this point, as he was still working in the advertising and marketing field for a living. On the other hand, Roberts had put considerable time and effort into the design of the game, as well as its sale and distribution. He had concluded that there would be a market for such games. As a result, he had an idea of what lay ahead. Between 1953 and 1958 he sold about 2,000 copies of *Tactics* and, in his own words, "came within about \$30.00 of breaking even."

Having produced and marketed this first game with some success, Roberts concluded that there was a market for a broad range of adult games. He expected to appeal to one segment of this range with *Tactics*. He also thought that other games could be sold which could be financially successful without appealing to a broad audience in the manner of *Monopoly*.

By 1958 Roberts was convinced that a living could be earned in the game design and sales field. At the same time, he found himself knee-deep in games at his home, where he had stored them. His wife objected most strongly and that, together with the success, caused him to consider designing and selling games on a more formal basis. In the spring of 1958 he took the first steps toward organizing a publishing company for the games he wanted to produce. By the fall of 1958, The Avalon Hill Company had been formed with Charles S. Roberts at its head.

## AVALON HILL:

### YEARS OF GROWTH 1958-1962

The Avalon Hill Company was *not* founded for the primary purpose of producing wargames. This point is often ignored by those in the hobby who have come to look to Avalon Hill as a source of games. Its true purpose was, and remains, to produce the broad spectrum of adult games for which Roberts felt there would be a market. Roberts felt that the big game publishers, Parker Brothers, Milton Bradley and the like, had ignored the adult game field and he was determined to take advantage of their indifference. From the outset Roberts made little effort to enter the popular game field of Parker Brothers and the rest. He priced his games at \$5.00 when other companies were selling theirs for \$2.00. This brought resistance from both wholesalers and retailers who thought that such a price would be too high. Roberts had the opinion that if people were interested in a game, "they would pay

\$5.00 for it; if they weren't interested, they wouldn't pay fifty cents for it." This set the basic selling strategy for Avalon Hill and events proved him correct as sales began to grow rapidly. In order to sell games at \$5.00 a copy, Roberts was forced to develop innovative marketing techniques, including a very heavy promotion program and high retail prices to support the program. His initial distribution was in Baltimore but soon Avalon Hill began to sell nationwide as his idea proved successful.

Although the first two games, *Gettysburg* and *Tactics II* were wargames, the next game, *Verdict*, was not. In fact, during the Roberts era, Avalon Hill published (in addition to *Gettysburg*, *Tactics II*, and *Verdict*) *U-Boat*, *Management*, *Chancellorsville*, *D-Day*, *Nieu Chess*, *Verdict II*, *Air Empire*, *Le Mans*, *Civil War*, *Baseball Strategy*, *Football Strategy*, *Waterloo*, *Bismarck* and *Stalingrad*, plus *Word Power*. Of these eighteen titles, nine are non-battle titles representing such diverse fields as law, commerce and sports. All of this reflects Roberts' desire to have a broad spectrum of games. Though one could not say a hobby had been born, it became clear that the most constant result could be obtained from the sale of battle titles.

The rationale behind a game such as *Gettysburg* is rather simple. *Tactics* was already out, under Roberts' own name, and the Civil War Centennial was coming. Roberts wanted to take advantage of the rise in interest in the Civil War. *Gettysburg* had a square grid system, just as *Tactics* had, though the square was soon abandoned for the hexagonal system as used in other Avalon Hill games. It is interesting to note that an attempt to reissue *Gettysburg* with a hexagonal grid system was unsuccessful and the version now sold is the square grid. *Tactics II*, which followed, was a reworking of *Tactics*. It also provided the advantage of a fully designed and tested game ready for production.

consequence, now in his early forties he is scarcely in his dotage and might smile to be considered the father of anything but children.

The early growth of Avalon Hill reflects Roberts' personality — outgoing and assertive. So, too, its failures reflect his faults. He is frank to admit that procrastination in shifting to single product marketing was a serious mistake. Activity was coupled with periods of inertia. However, the one comment constantly made about his administration of Avalon Hill is "integrity." Nowhere is that more apparent than in his decision to sell out to his creditors rather than leave them in the lurch via bankruptcy.

The emphasis of the company was also reflective of Roberts. He had been interested in World War II, notably the Russian front (and in fact has a desire to write a purely military history of that part of the war) and this interest is reflected in the line of wargames, the single largest part of the Avalon Hill line while he was there. His insistence on a broad spectrum company is also obvious and in fact, his own personal favorite among all the games he designed is *Management*.



## THE HEXAGONAL GRID SYSTEM

Everyone knows that some people still persist in calling hexagons "squares" in wargames and some people are aware that the first two Avalon Hill games, *Gettysburg* and *Tactics II* had squares instead of hexagons. But few know where the hexes came from.

In the early fifties, when Roberts was selling *Tactics* through Stackpole, he was contacted by a representative of RAND corporation. After much comic-opera super-secrecy, during the course of which things reached the point that the RAND man advised Roberts that they wanted to talk to him but couldn't tell him why because he, Roberts, wasn't cleared by security, Roberts learned that RAND wanted to know where he got his combat results table in *Tactics*. This is the same CRT used in all of the early Avalon Hill games. Further, it bore a resemblance to the more complex one RAND was using to wargame World War III and other horrors. The humorous aspect, as Roberts notes, is that RAND probably spent thousands of dollars to come up with the CRT he developed in a simpler form in fifteen minutes. It was no more complex than the basic doctrine that a defender can hold off a force three times its size.

This episode, in turn, triggered Roberts' interest in RAND. One day he saw a picture of RAND's wargame room and noticed that they played on a hexagonal grid. Recognizing a good thing and having had troubles with the square grid, Roberts took it over.



CHARLES S. ROBERTS —  
THE FOUNDING FATHER

It is fitting that a hobby appealing to people generally in their twenties should be started by a man of the same age. If anyone can be called the father of the hobby, it would be Roberts who, while in his early twenties, conceived *Tactics* and before he reached thirty had founded Avalon Hill. As a

Perhaps the greatest irony, however, is best expressed in Roberts' own words: "... what exists now, which we created at Avalon Hill in those early years, not so much by design but by default, it's the hard core of a new hobby. . . . That was not our intention, though. . . . certainly wasn't mine."

Nevertheless, Roberts is pleased with the growth of his creation. Even before he left he recognized that there was something there, as evidenced by tentative plans for a newsletter, later to appear as *The General*. The only development which he found displeasing, was the emphasis given in certain quarters to the Nazi/German aspect of the hobby. He recognizes that World War II is the most dramatic and fertile field for wargames and that the Germans do present both a challenge and a "colorful" side to consider. Nonetheless he rejects the idea that this should lead to the almost neo-Nazi activities found, particularly in some clubs, club names and club tactics, as they existed in the not-too-distant past.

Roberts still lives in the Baltimore area, now working as an executive in a printing firm. Though his time in the wargame field totalled no more than ten years, he began something the end of which is not in sight.

Not long after Avalon Hill got under way, Roberts saw that it was too much of a strain to handle on a part-time basis. He quit his advertising job and devoted his full efforts to making Avalon Hill grow. Before long, he turned to his former place of employment and recruited Bernard C. Schramm to fill a critical need at Avalon Hill. Schramm was experienced in the printing field and his knowledge enabled Avalon Hill to avoid the trial and error method of obtaining the printing results they wanted. Schramm had virtually nothing to do with game design and devoted his attention to management and production.

Despite the addition of Schramm, Roberts found he could not manage the company and still devote full time to game design. Again he turned to the advertising firm where he had worked and this time persuaded Thomas N. Shaw to work for Avalon Hill as a game designer. Shaw had previously designed two games which had been privately printed in the Baltimore area. Roberts saw them and liked them. The two Shaw-designed games were released by Avalon Hill as *Football* and *Baseball Strategy*.

Shaw arrived as Roberts was in the midst of expanding the line. Until his appearance, there were only six games in the line. The toy fair of Spring 1961 was Roberts' target date for doubling the size of the line. Shaw's first game was *Air Empire*, a game he designed based on Roberts' earlier *Management*. In addition, Shaw worked on *Verdict II*, helping to develop some of the cases used in the game.

During the period, Roberts took the lead in determining what games would be produced. No wargame produced by Avalon Hill during this period lacked his influence. Therefore many of the credits for game designs must be reconsidered. *Gettysburg* and *Tactics II* were Roberts' design from start to finish. *Dispatcher* was likewise wholly Roberts' design. *Verdict* was designed by two attorneys and therefore the first outside design. *Management*, *Chancellorsville*, *D-Day* and *Nieuw Chess* were all designed by Roberts. *Verdict II* was, again, designed by attorneys, with more direct influence by Avalon Hill in the form of cases being worked up by Shaw and the degree of difficulty being controlled by Roberts. *Verdict II* was a simplified version of *Verdict*, which it replaced. *Air Empire* was designed by both Roberts and Shaw. Roberts conceived the idea and influenced Shaw's work in putting the mechanics of the game together. *Le Mans* was another outside design, but *Civil War* was Roberts'. This was one of the few ventures Avalon Hill made into the popular game field. It was priced lower than the rest of the line and was to compete directly with Parker Brothers and the rest. Though not up to the standards of the regular wargames, it was a success and made a profit. *Waterloo* was the first wargame in which Roberts didn't have a major hand. It was designed by Shaw and one of his principal assistants, Lindsley Schutz. On *Bismarck* there is some difficulty in establishing who deserves primary credit. Roberts says Shaw and Schutz did the majority of the work: Shaw says Roberts sketched out the design and they just finished it off. The answer to the question of who designed *Stalingrad* turns on who defines the word "design." The idea was one that Roberts had for a long time. The mechanics were, by then, "standard" Avalon Hill rules. Roberts had previously roughed out the game on several different occasions and he turned it over to Shaw for final development. It was Lindsley Schutz who put all of the pieces

together by getting the background information. In terms of work done, the game is Schutz's but in terms of original idea and having the final decision on which way the game went, the game is really Roberts'.

Physically Avalon Hill was not self-contained. Although the design was done in the "plant," the final art-work, printing and other elements necessary for production were done outside. The two major outside companies were James Smith Box Company, which did the boxes and parts, and Monarch Services, which did the rest of the printing. Monarch now controls Avalon Hill as a result of the financial difficulties Avalon Hill later experienced.

The playtesting of the games, particularly at the outset, suffered from too few playtesters. As a result, rules additions and corrections were a norm. In part, the problem was solved by making use of outside testers. These people were drawn from the audience which had built up rapidly around the games. They wrote letters, often incisively, and weren't afraid to express their opinions: Avalon Hill would duplicate a quantity of "dummies" of the games and send them, with commentary sheets, to the more lucid of these co-respondents who were asked to point out any weaknesses they might find. As Roberts notes, this served two purposes. First, it cut down on the mail these people sent in about game mistakes since they had a chance to find the mistakes themselves before the games were printed. The second, and more important, purpose was that it gave Avalon Hill a handy semi-controlled body of people who could "de-bug" the games. Among the playtesters of this period was Louis Zocchi, who later went on to design such games as *Battle of Britain* and *Luftwaffe*.

Avalon Hill also explored the non-commercial wargame field. Roberts particularly tried to expand the educational value of the games, especially the wargames. He designed a game called *Gametrain* which he tried to sell to the U.S. Army Infantry School at Fort Benning, Georgia. The game was to be used for training an infantry platoon and was on a board measuring in excess of twenty feet to a side! When *Gametrain* was demonstrated to the Infantry School, it was accepted by the military men but rejected by the civilians, who had the final say. *Gametrain* never reached fruition.

In the non-wargame field, Avalon Hill worked with the American Management Association to develop management training techniques, an ideal field in light of the simulation aspect of the games. Roberts has remarked, somewhat ruefully, that he would have been a lot richer had he not spent so much time in these ventures. Yet, despite these side efforts, by 1962 Avalon Hill was doing a million dollars per year in sales.

There were other projects. When a new buyer sent in the registration card found in each game box, he would receive a flyer asking whether he would be interested in a game costing \$25.00 a copy. This game was only a general idea of Roberts. It was to be called *Conflict* and involve three hypothetical countries. Although *Blitzkrieg* was not an off-shoot of this, the idea is not unlike a super-*Blitzkrieg*. *Conflict* never got beyond this stage because the response was never great enough to warrant full development.

In any event, at the end of 1962, Avalon Hill had virtually cornered the adult game field.

## AH: DISASTER AND REBIRTH 1963-1964

In 1962, Avalon Hill experienced the first signs of potential problems. The most prominent of these was the growth of the discount houses which rivaled the retailer in many fields. Avalon Hill had distributed exclusively through the retailer system and relied on the salesman to promote their sales. The discount house didn't have the salesman-at-the-elbow idea. This meant that a different style of promotion was necessary. Avalon Hill considered making the change in promotion as early as 1962 but ultimately decided to wait until 1964. This proved to be a mistake.

A second problem arose out of trying to hold the line on prices. The discount house was undercutting the retail prices and games couldn't be "fair traded" as they once were. This insistence on maintaining the sales price also hurt Avalon Hill.

Thirdly, Avalon Hill had expanded rapidly by drawing heavily on credit. This permitted no serious cash-flow bind. But when, as happened in 1963, dealers representing some 25% of Avalon Hill's sales in 1962 went bankrupt, the cut in the cash flow, plus promotional problems, plus the cut in sales due to holding the prices all combined to cripple Avalon Hill. It could no longer meet its debts.

Roberts had two choices. He could proceed under the Bankruptcy Act, either by way of formal bankruptcy or reorganization, or he could turn the company over to its creditors. A bankruptcy proceeding might salvage the company but would certainly hurt the creditors, who would be forced to accept pennies on the dollar for Avalon Hill's debts. Roberts decided that it would be more honorable to give the creditors a chance to salvage something by keeping the company running. He therefore turned the company over to Monarch Services, one of the two largest creditors. He had paid off the majority of the small creditors and took this course in hopes of giving the remaining creditors a chance to recoup their losses. Roberts then had the option of staying on under Monarch or leaving. He chose to leave, as did Schramm. Shaw chose to stay, and has remained with Avalon Hill since.

In retrospect, Roberts attributes Avalon Hill's problems to two errors he could have prevented. He could have shifted the promotion system from the "shotgun" approach, selling the whole line, to the "rifle" approach of selling one product and letting it carry the line. This "rifle" technique is the more successful when dealing in the discount system. The failure to make this change when he first saw the need coming was one mistake. The second error was in failing to diversify. Roberts' feels that if Avalon Hill had had a second field of operations, such as printing, it would have acted as an "anchor to windward" and actually carried the company over the difficult period in the games.

At this point, then, Avalon Hill was dead. This is not to say that its products weren't being sold. Rather, games were no longer being designed, letters were going unanswered, orders remained unfilled. There were still some projects under way which were to have been completed in 1964. There were some games virtually completed and the idea of an Avalon Hill newsletter had been considered in 1963 but postponed to 1964 due to growing financial problems. Therefore, while Avalon Hill seemed to be still going quietly along to outsiders, insiders knew that it was dead.

When Monarch took over Avalon Hill, A. Eric Dott (president of Monarch) inspected the assets to see what could be done with it. Dott and Shaw proceeded to go through what was left and Dott concluded that Avalon Hill could be salvaged. He put Shaw in charge, since Shaw was the senior man left over from the Roberts era. Shaw had never done anything outside of the design field under Roberts and had no knowledge of marketing and promotion. As a consequence, Shaw was forced to undergo the same trial and error system that Roberts had encountered six years earlier. His first problem was getting a game ready for the spring toy shows. *Afrika Korps* had been the game Roberts was to produce in the spring but it was incomplete due to a play problem: the British were able to stop the German advance by putting sacrificial units in the German's path. Having no choice but to go with *Afrika Korps*, Shaw was forced to solve the problem. He did so by coming up with the over-run rule and in the space of a few weeks had put the game together. The over-run rule may be Shaw's greatest contribution to wargaming. The failure to solve that problem had held up production of the game for over a year. Moreover, Shaw had to piece out the game from notes left by Schutz when he left. From these notes and with the over-run rule,

Shaw started in late December, 1963, when the decision to reactivate Avalon Hill was made, and had the game ready for the toy show in February, 1964. As Shaw points out, things were so hectic in those first few months of 1964 that inventory wasn't taken until July of that year.

The second major move made by Shaw in 1964 was to publish *The General*. Again, Shaw delivered under pressure. The first issue came out in the spring of 1964, in the midst of all of the other tasks necessary to start Avalon Hill running again. *The General* was, and still is, written mainly by hard-core wargamers. In reality its major purpose was as a house organ to promote Avalon Hill games, a purpose which has never really changed. When it first came out, however, there was no similar magazine in the field, nor any rival wargame publisher. Therefore, *The General* covered all the major wargames then available. Editorial work was done by Shaw. He continued to perform this function until fairly recently when he turned it over to Randy Reed and Interest Group Baltimore. The latest change is to bring the editing of *The General* back "in house" with Donald Greenwood, (founder of *Panzerfaust*) as editor.

As far as Avalon Hill was concerned, *The*

*General* was a stroke of genius. It gave Avalon Hill a ready audience for advance promotion of games. In effect, subscribers paid for the privilege of seeing Avalon Hill advertising. Its second, and more important aspect, was the Opponents Wanted column. For the first time there was a nationally circulated publication which gave wargamers a chance to find out who else was out there.

The dividing line between the time when something is an item of interest to many separate individuals and when it becomes mutually enjoyed as a hobby is usually crossed without anyone knowing it at the time. Roberts has noted that while he then recognized that both a repeat sales market and a vociferous audience existed for wargames, he never considered a wargame hobby to exist. As far as he was concerned, at that time, Avalon Hill was an adult games publishing company. Publishing wargames was only a facet of the whole line of games. This is actually a realistic appraisal if viewed from the perspective of 1963. A year later *The General* had arrived and that could not be said any longer. A hobby was clearly being formed.

Despite the clear evidence presented by *The General's* avid readership, Avalon Hill continued to consider itself an adult game

## PRODUCING THE GOODS

Like anything else that appears in print, historical games require the efforts of many people and machines (as well as money) before they reach the people who will play them. SPI is something of an oddity among Adult Game companies in that it does its own product development. The other Adult Game companies (3M, Milton Bradley, CRM, Avalon Hill, etc.) depend on outside, "freelance" designers. The "normal" practice is pretty much to wait for the game to come to you. Parker Brothers, for example, gets some 3,000 games submitted to them each year. Less than one in a hundred will ever get published. Parker Brothers is the largest game company around, but the experience of all other game publishers is much the same.

Many game companies do look for games on a particular title. But that's the extent of it. They have to wait for someone else to produce the game they want. There are a few "professional" game designers around who can be approached about doing a game on a specific subject. But as yet no real "system" has evolved. It's still pretty much everyone for themselves. Except at Simulations Publications. We've created a rather novel approach to game design. We design games much the same way that magazine editors get articles done. Moreover, like many present day magazines, we use only our own people (salaried staff) to produce material. In order to support such a system many games must be produced. The members of the Research & Development (R&D) staff must be paid, thus creating a development cost for each game published. Add to this a thousand dollars or so in salaries paid to the art staff which produces the "camera ready art" work for the printer and you have over \$2,000

invested in a game before it even gets to the printer. This is actually much cheaper than the system used by other game publishers. Their custom is to pay the game designer a royalty for each game sold. Avalon Hill, for example, ultimately pays a royalty of over \$10,000 on many of its games. It pays this much money because this is how most game companies have traditionally paid for their game development.

One advantage of paying for game development on a royalty basis is that you don't have to pay these development costs until after the game is sold, and then only in proportion to the game's sales. The disadvantages of the "in-house" development concept is that you have to pay the development costs "up front". And the costs are the same no matter how successful or unsuccessful the game is. On the other hand, this system has many advantages. The development costs are much lower in the long run (even if you have to borrow the money at high interest rates). More importantly, under the "in-house" system there is much better control over product development. No more looking for the game you want. You simply develop whatever you feel you need. In-house development also provides for more and faster advances in the "state of the art" in game design. This is a necessity if you are directed towards producing a large number of games. The games become stale after a while if you don't innovate. You can innovate more easily if you have a full time staff working on games.

Many, if not most, game companies do have in-house art departments to develop the artwork for their games and game packages. Our art department has the further advantage of specializing in game-

component development. This complements our advantages in game design by ensuring that advantages gained by the designers are not lost through poorly designed game components.

The final stage of any game design is printing. Taken by itself, the actual physical production of the games is rather cheap. As it turns out, the printing cost is the smallest cost incurred in getting the game into the hands of the customer. If a game we published in 1972 eventually sold 50,000 copies the printing cost would be only some 25% of the game's cost to us. Shown in the Unit Price Chart are comparative printing and production costs for some typical classes of games.

You can see from the Unit-Price chart that some savings are possible when games are done in large quantities. The cost of a game in a thousand unit run is about 50% greater than the unit price of a 20,000 unit run. There are numerous other costs incurred before a game reaches the customer. For SPI's mail operation an average of 80¢ is for postage while another 60¢ is taken up to pay the people (and machines, we start using a computer this summer) who must "process" the order. This brings the total cost of getting a game to a customer to \$2.00, of which only 55¢ is the direct "cost of manufacture." The other four dollars of the six dollar game price is by no means "surplus" or "profit." About a dollar of it goes to help pay for S&T. The magazine is pretty much a losing operation financially. Subscription fees essentially cover direct production costs. What is not covered (to the tune of some \$6,000 per issue of late) is the "overhead" (salaries of the people who put it together, S&T's share of the rent, etc.). Another two dollars goes towards paying for the game R&D set-up (salaries

publisher. More importantly, it refused to shift emphasis to wargames in order to exploit the hobby. Avalon Hill *still* remains an adult game publisher.

Roberts never intended to create a hobby and, prior to his leaving Avalon Hill, had no idea he had done so. Second only to the creation of Avalon Hill and the publication of their wargames, *The General* was the most important factor in forming the hobby as it stands today. Despite the venturesome quality of Avalon Hill's actions in 1964, in terms of publishing *The General* and reviving Avalon Hill as a company, the attitude of Avalon Hill became more conservative. The consequences of this were not immediately apparent and are still the subject of debate.

Avalon Hill abandoned the full time design staff. Shaw filled both that job and a number of others by himself. Thereafter Avalon Hill turned to part-time designers. During the next two years (1964-65), the design work was done during the summer vacation, largely by Lindsley Schutz and Lawrence Pinsky. Between them they designed *Midway* for the fall of 1964, *Battle of the Bulge* for the spring of 1965 (done almost entirely by Pinsky, at home), *Blitzkrieg* for that fall and *Guadalcanal* for the following spring.

Second, they limited the number of battle titles to two a year: one in the spring and one in the fall. Actually, this works hand in glove with elimination of the design staff. A larger load would be impossible to carry with a limited staff and a large staff would not justify limiting production to two games. The immediate effect was a cost saving of approximately \$25,000 for each game not designed (that was the amount tied up in the production of each game). However, aside from the monetary considerations, Avalon Hill believed that the market would not tolerate more than two games a year. They felt that the hobby would become saturated or unable to afford all the games coming out.

This, then, was the basis for Avalon Hill's approach to the following years. The consequences of this policy will be discussed further, below.

### THE HOBBY IS BORN 1965-1969

Before the creation of *The General* there was no hobby. Until then the history of boardgaming could be neatly compartmentalized and discussed. After *The General* the hobby crystalized with a speed few would have predicted. It then grew and diversified at a rapid pace. Avalon Hill never chose to maintain

a dominant position in the hobby, as such. The obvious reason for this is that Avalon Hill is in the business of selling games, not creating hobbies. Further, Avalon Hill had no pressure to take the lead. Nobody else put out high quality wargames. If any innovations were to be found, they came from Avalon Hill. There was no incentive for Avalon Hill to be an active leader. Yet, in retrospect, it did not require a great amount of foresight to realize where the hobby would go and what would happen to the hobby if it lacked an active leader. Avalon Hill's benign neglect has been as important as if it had been an active leader.

At Avalon Hill, the conservative program previously mentioned resulted in their turning to outsiders for their games. By 1964, Schutz was an outsider in the sense that he was no longer working full-time for Avalon Hill. Pinsky had never been a full time employee. These two were the principal designers during the period 1964-65. Shaw, moreover, had never taken the lead in designing wargames. He had been involved in the design of *Blitzkrieg*, *Afrika Korps*, *Stalingrad* and *Midway* more in a supervisory capacity than true design (although his work on *Afrika Korps* was more than merely in passing). It was the wargame *Bismarck* on which Shaw did the most work. Ground combat was not his field and so others

and a portion of the general "overhead"). The remaining dollar goes into the "growth" fund (advertising to increase the circulation of *S&T*, which creates more buyers for the games, and so on). This distribution of the "surplus" will vary as conditions change. It should be sufficient to mention that this surplus is *S&T*'s only source of money with which to grow or expand.

Companies like Avalon Hill have a very different situation. For a typical "bookcase" game they spend about \$1.20 to produce the game. Another 40¢ goes toward shipping and processing of the order (AH ships most of its games in large lots and usually the buyer pays the shipping). About \$4.60 goes towards the buyer discount. In effect, a company like AH sells most of its games for about 50% of the list (retail) price. This leaves \$2.80 of which about 80¢ goes towards advertising and other forms of "dealer support" (sundry commissions, fees and promotion expenses). Out of the remaining \$2.00 must come "overhead" and, of course, the money needed to get new games published. In a situation like this Avalon Hill's profits could be substantial. From available information it appears that they usually aren't. The reasons for this are rather complex. Basically, it comes down to making too many incorrect decisions. But Avalon Hill does stay in business and continues. You can't argue with that kind of success.

Most of the figures given here are based on New York City prices. If anything, the prices in places like Baltimore should be less. The prices are based upon actual production experience. Which means you're liable to pay more if you don't have a lot of experience.

### UNIT PRICE CHART

Unit Prices for types of Games in Quantities Indicated:

Component	SSG	SSG	SPI	AH	AH	SSG
	1000 Envel.	2000 Envel.	5000 Retail Box	20000 Box	20000 Bookcase	20000 Envel.
Package	\$.05	\$.05	\$.25	\$.20	\$.35	\$.04
Map	.18	.12	.11	.24	.24	.07
Counters	.12	.12	.12	.12	.12	.12
Rules	.08	.07	.06	.05	.05	.04
Die	.01	.01	.01	.01	.01	.01
Play Aids	.02	.02	.02	.05	.08	.02
Assembly	.08	.08	.17	.18	.19	.08
Misc.	.03	.03	.08	.04	.04	.02
Total (+ 10%)	\$.63	\$.55	\$.90	\$.98	\$1.19	\$.44

The "SSG's" are our usual games shipped in plain white 12x15" envelopes. The SPI "Retail Box" Game is an experimental product of ours which is not available yet. It consists of the same game components found in the SSG's but packaged in a rigid, two color 12x15x $\frac{3}{4}$ " box. The AH (Avalon Hill) "box" is their original flat, rectangular box format. This is still used in most of their games (*D-Day*, *Stalingrad*, etc.). The AH "bookcase" is the familiar format of their latest games (*France 1940*, *Origins*, etc.). The components vary considerably in composition. The SPI and SSG game maps are identical to those found in *S&T* except for the heavier stock they're printed on. The Avalon Hill maps usually have two more colors and are printed on thinner, coated stock. These maps are then mounted on stiff board and cut for folding. The counters

are generally similar for all games. The rules folder also differs little, for all practical purposes. The dice used are all the same. The "Play Aids" differ somewhat. These are such things as extra charts and instructions separate from the rules folder. For the Avalon Hill games the "Play Aids" category also includes the ubiquitous 16-32 page "Battle Manual." Assembly includes collating and inserting the game components into the game package. For the AH and SPI box games this also includes "shrink wrapping" (putting that plastic stuff on the box). The "Misc." category includes advertising material and other "non-game" odds and ends. We have added 10% of the total cost to the final total to reflect the fact that there is a certain amount of "slippage" (waste, defects, rip-offs, give-aways, etc.).

did the design, under his supervision. Playtesting was done during the summer but there was even less control of the quality of the playtesters than under Roberts. As a result, it is hard to say how much time was wasted by "testers" who were really only around to play the games for fun.

After Schutz and Pinsky, Avalon Hill turned to James F. Dunnigan. Dunnigan had come to Avalon Hill's attention by writing a detailed critique of *Battle of the Bulge*, as well as some detailed monographs on various phases of World War II. He had never designed a game. Why Avalon Hill assumed that he *could* design one, based on his writings alone, is unclear. It probably falls into the same category as the decision to publish *The General* — intelligent guesswork.

Prior to the contracting of Dunnigan, all of the Avalon Hill ground combat games had been a variation of the 1953 *Tactics* and naval games showed little more difference between themselves. Dunnigan believed that different situations require different systems to depict them in a game. Thus, his first two efforts, *Jutland* and *1914* were unlike anything Avalon Hill had put out. They were both innovative and proved again that there is more than one way to approach a problem. More important to Avalon Hill was the fact that Dunnigan did his work in New York, not Baltimore. The game was designed, in effect, beyond direct control by Avalon Hill.

Being dissatisfied with Dunnigan's first two games, Avalon Hill turned to Dave Williams, who designed *Anzio*. Williams was as unafraid as Dunnigan in breaking with Avalon Hill tradition and he, too, did the design at home rather than in Baltimore. The saga of *Anzio* would fill a book itself. The "beyond direct control" system encountered real difficulties and Avalon Hill found it had a tiger by the tail: the game design wasn't going the way it wanted to go and Avalon Hill could do nothing about it short of scrapping the game.

The decision to eliminate a permanent design staff and to keep the games at two a year forced Avalon Hill to seek outside designers. However, in order to avoid chaos in its game design, Avalon Hill then became controlled by its designers since it had to take them where it found them or forego their work. If Dunnigan didn't want to move to Baltimore, they either put up with him working in New York or lost his services.

Another example of decentralization was the answering of letters. Initially, Roberts took pride in a formal written response to each letter. When outside designers became the practice, they were obligated to answer all inquires on game play for a certain period. Someone else was given the job of responding to the letters on the older games. This person might be as far away from Baltimore as Albany, New York. At that distance, Avalon Hill had no real control over what was said to the writers. Interest Group Baltimore acquired the job in recent years, bringing it back "home." During this time, however, it was quite beyond Avalon Hill's practical control.

As mentioned above, the growth of the hobby became less and less orderly as time went on. Several changes happened at once. While Avalon Hill was decentralizing, another facet of the hobby was forming: the clubs. The majority of the hobbyists are not club members, but the clubs — being the most organized — made the most noise and had an

## HOW TO MOVE THE GOODS

One of the potentially insurmountable hurdles any publisher must face is getting his product into the hands of the buyer. There are basically two methods. The most straightforward, of course, is to sell direct to the customer. A manufacturer can either do this through his own retail outlets or, more commonly, by mail. This method is the least-used in this country (it's more popular in Europe). The more common method in this country (and everywhere else, for that matter) is to sell in bulk to wholesalers who in turn sell to retailers who, in turn, sell to the public. "Wholesaling" has the benefit of getting wide distribution without the expense of setting up your own retail outlets. Unfortunately, this means higher prices for the consumer. The "middlemen" (the wholesaler and retailer) must be paid for their services. The cost is passed on to the consumer. The rule of thumb for the publisher in this set-up is that the retail price of the product will be six to nine times the production cost. Thus a nine dollar game will cost from \$1.00 to \$1.50 to produce. But there are more problems. Before a distributor (wholesaler) will take a game he must have some assurance that it will sell. The thing he looks for most is an attractive package. The publisher must provide this. An attractive package drives up the production costs. Above a certain price the distributor will refuse the product as unsellable. The only way to keep the price down and still have the attractive packaging is to produce in large volume (over 10,000 units at a time). To have large volume you must have wide distribution. And this brings us to the final catch. Distributors normally don't pay for what they "buy" until 90 or 120+ days after they take the goods. This means that you must have the money to produce the goods and not expect to see any return on it for about three to four months or more. This problem is made even worse by the fact that most games are sold in the last four months of the year. Yet, they must be available in the Spring. The distributor wants to see what products sell the best so that he will have as few duds as possible in the stores when the end-of-year "buying time" comes around. This means that you actually have to carry most of the production costs for six months or more. All this boils down to the fact that to publish and sell a game through wholesale distributors you must have the use of \$25,000 for six months.

Whenever a new game is published there is always that chance that it will not sell. The chances of this can be diminished by testing the market and carefully developing your product. Both of these procedures cost money. A staff of two or three product development (game designers) and market research people would cost \$40,000-\$50,000 a year. With a group this size you could probably produce 4-6 games a year (assuming the lowest level of competence) or as many as 10-12 (assuming the best). Do things this way and you're committed to an annual investment of \$200,000 a year to produce six games. All of this depends on choosing the right people to do the job. It also depends on knowing what you're doing. The best example of a game

company using this approach is the 3M company. They use mass distribution, attractive packaging, product testing and development (although they don't use "in house" game designers). They put a lot of money "up front." So far, it's paid off for them.

During the past ten years there has developed a second method for "moving the goods." It involves establishing a steady market through a magazine. The best example is *Psychology Today* magazine. A more recent example is *Saturday Review* magazine. Another example is *Strategy & Tactics* magazine. What each of these magazines does is to analyze their subscribers and discover what they want. The magazine then sells these items itself. In the case of *Psychology Today* and *Saturday Review* they sell books (their own, or others through a book club), games and whatever else there appears to be a market for. *S&T* does the same thing only in a more specialized sense. *S&T* goes to a smaller audience (15,000 subscribers as opposed to over half a million of *Psychology Today* and *Saturday Review*). At the same time *S&T* must put a lot more Research & Development into its products (historical games). But a system such as this has many advantages. For one thing, we are paid for our games before they are "sold" (delivered to the customer). We must tie up only about \$1,000 in production costs, and then only for about two months. Another three thousand dollars in R&D costs are also involved. It takes a few more months for a new game to "pay" for these. This sort of system has the opposite effect of the "distributor" system. The "Magazine Market Direct Sell" approach encourages the development of as many new games as possible. There is, however, a limit to what will be bought. But this appears to be about 10-20 \$5-\$6 games a year per subscriber. Since these games get into the consumers' hands much more quickly than in the "distributor" system and the money does not get hung up with a middleman for so long, it is obvious why such a system has many advantages. Like any other system, you have to know what you're doing. But then an idiot could go broke operating within the "distributor" system. The wholesale distribution system will work, for all its faults. It is easier to work with and most games are still sold through it. The Magazine Market Direct Sell (MMDS) system is simply more efficient, although more difficult to set up. The MMDS system, requiring less money to launch a new game, allows for more experimental games to see publication. Such a system also allows more games to remain in print. Game companies that use the distribution system can only have so many games in their "line". The retail outlets have limited space to display any companies' games. This puts a limit on the number of different game titles any company can make available. After a certain point the retail outlets simply have no more space to display additional titles. Therefore, after a certain point (say 16 game titles) each new title will displace one already in the line. Under the MMDS system the theoretical limit to the number of titles the market will "support" can be numbered in the hundreds.

influence far beyond their size. Oddly, the low profile Avalon Hill took prevented the clubs from having the impact they might have had. Avalon Hill simply could not react to the clubs with any real flexibility.

A third element, growing at the same time everything else went on, was the hobby-produced magazine. Few were started with any intent to rival *The General*. Most were mimeographed or mimeographed. The term "zine" has often been applied to them. That term, in turn, is taken from the world of science-fiction fandom and anyone who is familiar with a "fanzine" knows why the term applies. There were few pretensions to quality in fact. Often as not, they were club organs or publications with very small circulation (a few hundred subscribers, at most). They usually did nothing more than give the editor/publisher/sales author a chance to voice his opinions. Further, they came and went with frightening speed, usually taking with them any subscription payments which hadn't already

been spent. 'Zines, like the clubs, were the creation of *The General*. This is not in the sense of mimicry but because *The General* gave free advertising and gave the 'zines a purpose — there is no need for a newsletter if everyone lives in the same town, but statewide or national circulation is another matter.

At this point it is fitting to note the arrival of *Strategy & Tactics*. Christopher R. Wagner, then a Staff Sergeant stationed with the U.S. Air Force in Japan (and environs) had decided that something more could be done with a wargame journal than *The General* was doing. First, he saw no real signs of "edited" articles in *The General*: as long as they weren't libelous they were published. Second he saw no cohesive editorial concept holding the magazine on one course or another. Third, the quality of the articles was very uneven. The few good writers were counterbalanced by the mediocrities. At the same time, he didn't want to put out another 'zine, with poor reproduction and the reliability of mist.

As a consequence in 1966 he and Lyle E. Smethers, another fellow stationed with him in Japan, decided to put out their own effort. He wanted an alternative to *The General*. Wagner decided to add areas excluded from *The General*, such as miniatures and, as they appeared, non-Avalon Hill wargames. He contacted Shaw who was helpful but mildly discouraging. In this instance, Wagner agrees that the discouragement was not that given to a potential rival but sound advice. Wagner calculated that he could achieve fifty percent of *The General's* circulation. Shaw had indicated that *The General* had a circulation of 5,000. If he had 2,500 circulation, *S&T* would be successful. Thus, he started off with a printed magazine on glossy paper. His calculation proved correct. *S&T* did achieve fifty percent of *The General's* circulation, but the paid circulation of *The General* was only around 2,500. With a circulation of 1,200, *S&T* was doomed to be economically unsuccessful.

Wagner got the magazine off the ground by soliciting articles through the mail. Since he was in Japan, he got Henry Bodenstedt, a toy shop owner in Adelphia, New Jersey, who was interested in miniatures, to write articles about miniatures and distribute the magazine. In exchange for this, Bodenstedt got free advertising and thus advertised items which were, curiously enough, ideally suited for use in the games he was writing about in *S&T*.

Wagner ran the magazine from Japan, getting articles from the United States, negotiating with the Japanese printers, sending the finished copies to Bodenstedt and starting the cycle again. His initial band of contributors came from three areas. The first group were his friends in the Air Force such as Smethers and Scott Berschig. Second he used some of the people who had written for *The General*, such as Donald Greenwood, Louis Zocchi and John Dotson. Third, there were those such as Dunnigan who came to Wagner's attention through published monographs.

#### WARGAME SALES: 1964-1972

Year	Avalon Hill	Game-science	SPI	Other	Total
1964	62,000	0	0	100	62,100
1965	65,000	200	0	100	65,300
1966	66,000	220	0	200	66,420
1967	85,000	360	0	400	85,760
1968	92,000	11,000	0	500	103,500
1969	96,000	2,000	2,500	1,200	101,700
1970	115,000	1,100	11,500	1,800	129,400
1971	155,000	400	27,900	2,500	185,800
1972	183,000	280	151,000	3,000	337,280

Sales figures for Avalon Hill are largely estimates. Avalon Hill is very secretive about their sales. However, they pay royalties on many of their games (nine of their current line, in fact). Thus sales figures are available on many games. Data collected from other "unofficial" sources has enabled us to construct yearly sales figures which we are quite certain are accurate to within 10%. SPI sales figures are considerably more accurate. SPI sales include both the "separate" games as well as those sold with magazines. The 1972 figures are, of course, projections based on January-June 1972 sales. SPI sales for '72 are rather conservative. Between June '71 and June '72 SPI sales increased over 600% (our largest growth period) and SPI's sales curve is still more vertical than horizontal. The only other major publisher of historical games, Gamescience Corporation, sold about 15,000 games between 1967 and 1971. Most of these were sold in 1968/69. Their sales are insignificant now. Other publishers are appearing, all of them very small. Their combined yearly sales are now a few thousand games at most. Sales of *Diplomacy* and other similar games (*Risk*, etc.) are not included in the above estimates. Avalon Hill sales for the period

1958-1963 are available only from Charles S. Roberts. While Mr. Roberts offered to dig the figures up, he was unable to get them to us before this went to press. However, from the interviews we conducted with him it is possible to reconstruct to a certain extent what sales were like during the pre-1964 period. Starting out slowly during the 1958-1959 period (hitting 20,000+ yearly game sales during that time) things really took off in 1960 and peaked in 1962, when more than 100,000 wargames were sold. With the collapse of the AH distribution system in 1962 game sales took an enormous nose-dive and bottomed out in 1964. Many wholesale and retail outlets that did not collapse were nonetheless "burned" by the inability of Avalon Hill to maintain delivery service during this period. People would order games but things were such a mess at AH that the orders were simply not filled. Many of these outlets wouldn't touch AH products for years because of this. After a few years, however, AH again established a reputation for reliability and sales began to climb once more. The fact that more games appeared, particularly some of AH's best (*Afrika Korps*, *Battle of the Bulge* and *Blitzkrieg*) also built continued sales.

#### WHY GAMES DON'T GET DESIGNED

An odd fact was unearthed in doing research for this article. Avalon Hill has, from the start, developed the title before developing the game. This produces an odd result. If the title is a likely winner, a game is designed. The usual process, under Roberts, was a "brain-storming" session where titles were suggested and reactions noted. The results were rather curious. For example, *Le Mans* was originally to be entitled *Grand Prix* and have the Watkins Glen race course as its game map. The more they thought about it, the more they realized that a lot of people can't speak French and thought of a saleswoman having to hear that title anglicized resulted in a major change in title.

In the same vein, Avalon Hill has never designed a naval sail-era game. The reason was they reached an impasse at the title. They all agreed that *Frigate* was the best but no one wanted to see that title on the shelves. Remembering that this was in the early 1960's, the attitude is understandable. But the results are interesting.

The parting of the ways between Bodenstedt and Wagner is more fully detailed in *S&T's* reprint of issues 1 to 6, now available as *Book 1*. Suffice it to say that Wagner subsequently used his mother to distribute the magazine. At the same time, he decided to leave the Air Force and return to the United States. Issues 1 through 10, constituting the first year's publications, were all printed in Japan. Thereafter they were printed in the United States.

During the first year *S&T* continued to grow in quality and quantity. Illustrations became better and a glossy cover was first used for issue 7. In addition, paid advertising appeared in the magazine. The increased quality was not coupled with a serious effort to promote new readers, however, and the overhead began to grow. Returning to the United States, Wagner found the cost of printing the magazine to be much greater than in Japan.

During this period, the editorial staff underwent some upheavals. Many of the original writers lost interest. However, some regulars, such as Rodney Walker, began to appear. In the middle of the second year, Wagner secured the services of Redmond A. Simonsen, under whose artistic hand the over-all appearance of the magazine took a major jump.

By the second year, the story of *S&T*, from the inside, was a quest for money. Wagner had been trying to make a living from *S&T* and had even paid some money to contributors. The end of the first year, however, saw a renewal rate far below the 100% he had expected (closer to 70% in fact). Without a comparable lot of new subscribers, the circulation began to decline. Wagner had exhausted the sources of subscribers available to him which meant that *S&T's* circulation slowly spiraled down. He tried to sell games through *S&T* in hopes of helping the magazine with the profits from the sales. Notable among the lines carried was Gamescience from Philip Orbanes. But this leveled off so that by the time issue 12 came out, Wagner took a part-time job and began to borrow money to keep the magazine afloat. His problems were further compounded by printer delays. On one occasion he personally collated the magazine late at night in the printer's shop. He changed printers twice in the last two issues under his administration but to no avail.

Despite financial problems, he did not let the quality slip. In fact, the first two-color issue was the last under Wagner — Volume 3, number 1 (issue 17). But, as Wagner acknowledges, reality has a way of catching up. By the time issue 16 was on the presses, he knew he could either print number 17 and leave the printers with uncollectable debts or stop at 16 and leave the subscribers hanging. He printed number 17.

At the same time, he put out feelers to see if anyone would take over the magazine. The two major wargaming clubs, Spartan International and International Federation of Wargamers, were both approached. Things reached the stage with IFW that some materials were actually shipped before the deal fell through. *S&T* had reached the end of its tether. No one wanted it. Wagner couldn't afford it and Simonsen, *S&T's* premier artist, was disillusioned to the point of having no further interest in it.

Still another facet of the hobby growing during this period was the non-Avalon Hill, non-major



THOMAS N. SHAW —

### THE MAN IN THE MIDDLE

Thomas Shaw is a direct contrast to Roberts both physically and temperamentally. Shaw is a rather quiet, methodical person as opposed to Roberts' outgoing, almost mercurial approach. Although Shaw and Roberts had gone to high school together, the sole reason for his joining Avalon Hill was his design skills. In that function he controlled the Avalon Hill design team but had nothing to do with marketing or management. However, when the Roberts era ended, Shaw was put into all of those jobs by A. Eric Dott. As a result, while Dott has the final decision, Shaw puts it all together and makes recommendations. As a result, he is truly the man in the middle at Avalon Hill. He is the most visible one there — many people don't even know that he is not the head of Avalon Hill. Until recently he edited *The General* himself and, particularly since Pinsky and Schutz left, he has kept open the lines of communication with the hobby and game designers. Had he not, Avalon Hill may well have left the wargame field.

Although a game designer at heart, Shaw does not consider himself a wargame designer and is only involved when he must be. He provided the continuity from the Roberts era with the result that there was little visible change in the type of product produced, (particularly in the wargame field) until fairly recently. In that vein, he has ensured that Avalon Hill remains active in the field of adult games.

As the man in the middle, it is easy to fix upon him when discussing the basic Avalon Hill philosophy toward wargames as he is their most visible advocate. Shaw has expressed the idea that wargames, while providing a constant market of about 20,000, will never provide the big sales. Avalon Hill's records bear this out, at least as far as their games are concerned. On the other hand, Avalon Hill has never tried to see how hard they can push the market. In all fairness to Shaw, he cannot compel Avalon Hill to expand its sales in wargames by an intensive sales campaign. That would be Dott's province. On the other hand, only Shaw, as the man in the middle, seems capable of putting together the information which might change Dott's mind.



CHRISTOPHER R. WAGNER —

### THE MAN AND THE HOBBY

Christopher Wagner is important to the hobby because he founded *S&T*, which is not as self-centered a statement as it appears.

Wagner had become interested in the hobby in the 1960's. While a member of the Air Force he was sent to Yale to learn Chinese. Although the press of military activities and the initial absence of any opponents caused him to lose some interest during the next few years, after a while more men were assigned to his unit in Japan and he found others with the same interest.

The reason why Wagner created *S&T* is mentioned elsewhere. The mere fact he did so is of importance. *The General* was then, as now, a house organ of Avalon Hill and primarily concerned with making money by promoting Avalon Hill products. Wagner's determination to put out *S&T* in professionally printed form required a basic determination which no one had had the opportunity to make before: that there was a hobby and that it was big enough to afford a living to someone (or a group of people). That his efforts proved unsuccessful, in that he ran into financial trouble, is immaterial. His error was in assuming that the hobby was large enough in 1966 to sustain a magazine such as *S&T*. In fact, it was a very small hobby. It had grown almost exclusively by word of mouth. Avalon Hill was only interested in promoting its games, not the hobby (which is as it should be for a company in the business of making money). Without any real effort to cause the hobby to grow, progress could only be slow. *S&T* was therefore doomed before it started. In point of fact, *S&T* can still not sustain its level of quality on subscriptions and advertisement alone, even though its circulation is twelve times what Wagner had at his best.

Wagner has noted that if he had known what he came to find out the hard way, he never would have started *S&T*. Had he not, someone else would have, because the hobby needed such a magazine. If another magazine had not been started, the club magazines would probably have filled the gap, though perhaps not as rapidly as they have done with *S&T* leading the way. The need was there in 1966 but the hobby wasn't big enough to sustain *S&T*. The decision to try it despite such problems is Wagner's great contribution to the hobby.

company, game. The first efforts were poor to say the least. They were often spirit mastered with sheets that never matched up and counters that disintegrated on touch. It was apparent, before long, that this type of game would only have marginal success. The question was whether a well done game could have any success outside of Avalon Hill.

At this point, Philip Orbanes becomes the focus of attention. Orbanes had ventured into the game design field with a spirit-duplicated game called *Operation Gigantus* in 1964, while still a high school student. The game was a cross between *Diplomacy* and an Avalon Hill game. Although this met with only moderate success, Orbanes decided to go further. He formed Gamescience, a corporation, in 1965 and published a game called *Viet Nam*. This was a high quality game with a regular, mounted game board, plastic pieces and a white box with a label. This was sold by arrangement with Avalon Hill in that Avalon Hill operated as a funnel for sales by accepting orders which they would then forward to Orbanes to be filled.

In 1967 Orbanes produced *Confrontation*, a game printed on heavy cardboard in three sections and mailed in a large tube. The map was an overprinted Rand-McNally world map which formed a gameboard sixty by thirty inches. This system of packaging was so successful Orbanes re-worked *Viet Nam* along the same lines. This game was distributed the same way as *Viet Nam*.

Orbanes's real breakthrough came as the result of Avalon Hill rejecting Louis Zocchi's game *Battle of Britain*. Wagner was aware of Zocchi's game and believed that the title was a good one. Wagner suggested that Zocchi and

Orbanes get together with the result that *Battle of Britain* was a major success. It proved so successful that Avalon Hill stopped helping Orbanes' sales and treated Gamescience as a rival.

It wasn't a rival at that point. Whether it might have been is a moot question. Orbanes decided to invest a major amount of money in the game and sell it at the February toy show in Chicago. In the interim, he upgraded *Viet Nam* and *Confrontation* by printing the maps on Textoprint (something like oilcloth, only better), with die cut counters and printed rules. *Battle of Britain*, on the other hand, was in the then standard Avalon Hill format of a long, flat box. At the toy show, Orbanes was approached by a representative of Renwal, the model manufacturer. They wanted to expand their line into other toy fields and felt *Battle of Britain* to be the game. As a result, they persuaded Orbanes to sell all of his assets to them in exchange for royalties. He kept the company's liabilities (which were rather large by then, due to promotion expenses) but expected to pay them off soon from royalties. In fact, royalties never came in any large amount. Renwal sold only a fraction of the amount Orbanes was selling earlier and thus ended the first rival to Avalon Hill.

What Gamescience brought to the field was the concept of different systems for different situations. This was the same idea Dunnigan had explored in *1914* and *Jutland*. Moreover, the success of *Battle of Britain*, after it had been rejected by Avalon Hill, gave dramatic proof that Avalon Hill could be wrong.

Actually, Gamescience didn't disappear. The the name was taken over by Renwal, the corporate shell (and debts) remained.

Orbanes and Dunnigan decided to use the corporate shell and form Operation Design Corporation which, in turn, became a subsidiary of Infinity Quest. The function of ODC was to provide a corporate shelter for Dunnigan's winsome creation, Poultron Press which, in turn, was the new publisher of *Strategy & Tactics*.

The story of the salvaging of *S&T* forms a suitable end to this period, as well as marking the start of the current phase of development.

As mentioned, Wagner had been casting about for someone to take over *S&T*. Dunnigan had been approached but saw it as too big a job. However, Dunnigan had been working with the idea of producing a large number of games. Obviously he couldn't sell them through *The General* since Avalon Hill wasn't likely to cut its own throat. *S&T* was the only other magazine with any circulation worth talking about. The net result was that Dunnigan decided to take over *S&T*. He had a group of friends in the New York area interested in the games and he grabbed the most visible of them and told them that they were going into the publishing business. He also contacted Simonsen to do the art work. Simonsen, in essence, told Dunnigan that he had had enough of *S&T* after the work done on issue 17. As a result, Dunnigan set about creating issue 18 out of whole cloth. A few articles from the regular writers were available but the great body of issue 18 was written and pasted-up by Dunnigan. When Simonsen saw that issue 18 was going to come out, he agreed to do a quick cover and some incidental graphics and thereby began to re-involve himself with *S&T*. With that melodramatic turn of events, issue 18 was printed and in so

## HOW MANY PEOPLE PLAY THE GAMES?

No one has really tried to estimate just how many people there are who play simulation games. Based on the information we have now (and the rather complicated analysis we have performed on it) we can make some assumptions. At its peak there were probably some 40,000 to 50,000 people playing Avalon Hill games (1960-63). With the collapse of AH's distribution system in '63 many people were cut off from retail outlets for AH games. By '64 the number of active players probably came down to 15,000. We have found that it takes time for people to become "actively" interested in the games. It is also necessary that people have a selection of games to choose from. Without this selection many lose interest. The failure of Avalon Hill to widen their line lost many potential steady customers. All AH had going for them was what they religiously call the "spread effect" (word of mouth "advertising"). Between 1964 and '66 new game introductions sold no more than 20,000 units the first 12 months. The two "bombs" published during this period (*Midway* and *Guadalcanal*) sold only about 60% of the "good" titles (*Afrika Korps*, *Battle of the Bulge* and *Blitzkrieg*). With the publication of *Jutland* in 1967 (and the "class" box cover painting urged upon AH by Jim Dunnigan, the game's designer) AH finally sold more than 20,000 units of a game in its first year (23,000 to be more

precise). The next title, in '68, sold even more (*1914*, 24,000 units). Again, a "class" cover was insisted upon by Dunnigan (*1914*'s designer). The next year, 1969, AH switched designers and produced an atrocious box cover and game called *Anzio*. It sold only 11,000 copies its first year and never really caught on. It has since been dropped from AH's line. The following year's introduction, *Kriegspiel* (1970) only did 13,000 the first year. This game was produced completely "in house." While total yearly sales were up 85% over 1964 this was primarily due to the fact that there were more games for people to buy and there was a rather large "hard core" (now about 20,000 strong) which would buy just about anything AH produced. But a poor game would not only lag in initial sales, it would also sell 60-70% as well as the "good" titles on a continuing basis. On the average, a "good" AH game would continue to sell about 5,000 units a year after its first year or so. But between 1964 and early 1970 AH introduced nine new games of which four (45%) "bombed" (*Midway*, *Guadalcanal*, *Anzio* and *Kriegspiel*). Then they came out with *PanzerBlitz*. The packaging was, for a change, attractive. The game sold 25,000 units its first year. The game was also in the new, appealing bookcase package. The following game, *Luftwaffe*, did even better, selling 28,000 its first year (although it was not able to keep up with *PanzerBlitz* after its first six

months). *Origins of World War II*, a very different game, also did quite well in 1971, selling 26,000 copies its first year. At the same time (1970-71) SPI got into high gear. Basing their operations on the premise that people would buy more games if they were cheaper, available in a wider assortment of topics and of high "game" quality, SPI sales soared. Subscribers to *S&T*, the "hard core" of SPI's customers, were each buying more than 12 games a year. And this increased as more games were made available. Not all titles were received with equal enthusiasm, but even "poor" games sold enough to be kept in stock under SPI's system. By now the "hard core" of people who bought and played historical game-simulations regularly, had risen to nearly 40,000. Most of these were "brought in," as before, by the availability of AH games in retail outlets. Most of SPI's advertising had merely caught on with these people. A few thousand had been brought in by SPI (people who were ignorant of Avalon Hill). The number of these people will no doubt increase. In fact, accurate projections based upon SPI advertising experience to date indicates that the potential "hard core" numbers around 100,000 people. That's a conservative (but quite likely) figure. These are the people who will spend between \$20 and \$100+ a year on their "hobby" of simulation games. If you're reading this, chances are you're one of these people.

doing *S&T* was salvaged. More importantly, Dunnigan introduced several games in issue 18 which were to be the core of the Test Series Games, including *Tactical Game #3*, the model for *PanzerBlitz*.

## THE SECOND GENERATION: 1969-THE PRESENT

The period since 1969 has seen the birth of the second generation of virtually all aspects of the hobby. The warring clubs of the previous

period were replaced by the more mature clubs, such as Spartan International and IFW. Even the zines took on a better quality. Club newsletters and the like lost their parochial approach and turned toward general interest. At the same time, spirit master and mimeograph were replaced by offset for the zines in more and more instances. These zines have also produced a body of writers whose works appear with regularity in the better quality zines. At the same time, there still remains some of the old zines around. Even the

(continued on page 22)



JAMES F. DUNNIGAN —

### WARGAMES AND THE HIGH SCHOOL DROPOUT

James Dunnigan is an unlikely person to occupy the position of "Dean of Wargame Designers," particularly when he is not yet thirty years old. He is, in fact, a high school dropout, a point he delights in making to those who inquire as to the prerequisites of being a wargame designer. As with Wagner, Dunnigan became interested in the games at the start of his military "career" (1961-64), lost interest after he went overseas and then became interested again. Actually, he determined, while in the service, that a college degree would be a good thing to have so he remedied the high school deficiency and got his degree from Columbia. It was while a student at Columbia that he first came to the attention of Avalon Hill. He had written a detailed critique of the *Battle of the Bulge* and from this Avalon Hill reached the non-sequitur conclusion that he could also design games. As he had never done so, this appeared a novel idea and Dunnigan tried it. The result was *Jutland*.

At the same time, he produced a series of pamphlets on various World War II campaigns. These pamphlets brought him to Wagner's attention and Dunnigan was involved with *S&T* on a limited basis from the start.

Dunnigan's contributions to the field stem from the basic idea that nothing should be taken more seriously that it deserves to be. This, coupled with the belief that history is a great deal more than a cold recitation of facts, allows him to make unorthodox appraisals of history. When applying these to wargame design he developed the premise that different situations require

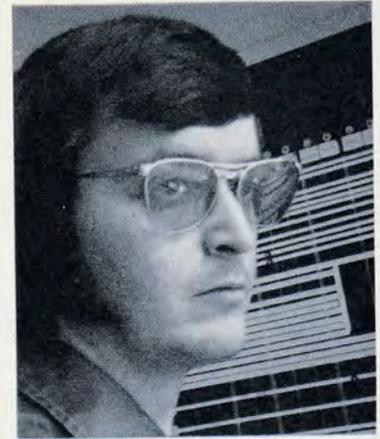
different solutions and can be depicted in a game through a "systems analysis" approach. The result was, for the first time, a reasonably accurate simulation of a military/historical event. It is this same premise that appears again and again in games he designs or which are designed under his supervision.

It is always easier to use a tried and true format and make minor alterations to suit the situation. That was the old Avalon Hill system. The Dunnigan system assumes that nothing that was used last time will necessarily be used this time. If it can be used, fine. If not, don't hesitate to throw it out and find something more suitable.

Out of the same basic philosophy is the flood of games produced by Dunnigan and others under his direction. Whereas Avalon Hill has taken the position that the market could be glutted by too many games, Dunnigan believes that the more games there are, the better the choice. Given the right subject, anyone will buy one more game. Avalon Hill contends that the number of topics for games is limited. Dunnigan disputes this by reeling off a list of potential titles.

The result of the seemingly unerring Dunnigan touch (though he will readily admit to having made mistakes) is that people tend to speak of him as a genius, a notion he rejects as invalid. Actually, in this instance the key to his "genius," if the term is to be used, is readily recognizable. It is his refusal to be bound by a fixed pattern if the pattern does not fit. We are all creatures of habit since it is easier to do the same thing until you achieve perfection than to try to do a task a different way each time. Routine is a common practice. To develop a new method of doing something always requires more effort than following a pattern. So, while others are following the pattern set out in the last game, Dunnigan is off developing a new system. *The General* works on the theory that a given article will generate a number of publishable replies which will in turn spawn new replies and give a "safe" source of articles for issues to come. Dunnigan, on the other hand, will not hesitate to try something just because it seems interesting and hasn't been done. If it succeeds all well and good. If it fails, then at least a lesson has been learned.

If there is any irony in it at all, it is that Dunnigan rarely plays the games he has designed, or any others for that matter. The intellectual satisfaction of designing has replaced that of playing.



REDMOND A. SIMONSEN —

### GRAPHICS AND GAMESPEAK

The most subtle but most pervasive touch in all of Simonsen's efforts is that of Redmond Simonsen. Subtle because the nature of his work is all but unnoticed until one tries to duplicate it; pervasive because the final form and appearance of the magazine bears his touch.

Simonsen is a trained artist (BFA, Cooper Union 1964) who did make a living at the field of graphics prior to working for SPI on a full-time basis. As such, he is a unique find. Moreover, of all the people at the top of the heap in SPI, he probably plays the games the most. The combination of artistic ability and an interest in games is obviously the best thing that happened to *S&T* and wargames in general since *The General*.

In fact, Simonsen sought *S&T* out, rather than the other way round. He subscribed back at the time Wagner was running the magazine, saw that he liked the magazine and determined that the graphics left much to be desired. Almost as a personal challenge, he decided to draw some illustrations for a hypothetical magazine (this without even talking to Wagner on the subject) to include a cover, interior illustrations and the logo. He submitted the package to Wagner who, recognizing a good thing, grabbed what he got. The now familiar *S&T* logo was first used on issue 13, together with other of the illustrations Simonsen submitted. The experimental cover he had designed eventually appeared in issue 16.

From that point on, Simonsen became *S&T*'s artist. He worked out much of his contributions by mail and infrequent visits between his home in New York City and Wagner's in Albany. But despite the distance, his influence became more apparent. His efforts culminated in the two-color issue, number 17, that ended the Wagner era. As mentioned elsewhere, he became disillusioned and at first rejected Dunnigan's offer to rejoin *S&T*. In fact, little of issues 18 or 19 were illustrated or designed by Simonsen. But thereafter, he took a more active hand and has since carved out a permanent niche.

Simonsen's contributions in the field of graphics are, as mentioned above, difficult to recognize unless pointed out. Then they become readily apparent. The very layout of the magazine is his determination, in terms of illustrations, type styling, and general blocking of articles. More importantly, his skills in graphics are of major value in the games produced by SPI. His most significant effort has been the attempt to minimize the number of pieces of paper one must use to play a game. He has done this by transferring data to the game map and, more importantly, to the counters themselves. The ever-increasing numbers on the counters all reflect the desire to provide the player with the maximum amount of data available at his finger tips, rather than buried deep in the rules. This, in turn, allows more complex rules since the piece contains the information necessary to apply the given rules. For example, if one has "class 1" plainly marked on the counter, there is no need to constantly search the rules everytime this piece is used to see what the specific unit can do; the only requirement is to check what class 1 pieces do. Further, many design problems which are solved by graphics would be impossible to write easily in rules. The whole concept of obstructing the line of sight in *PanzerBlitz* was solved neatly by a solid, colored line on a hex side - a graphics contribution by Simonsen. If a rule had been written to explain the situation, a paragraph would have been required just to explain what can now be readily seen.

The second area of interest where Simonsen's influence is felt is in the rules themselves. He has always rejected the notion that there need be any confusion in the rules for games, even if they are complex. He has therefore tried to standardize the terms and the formats used in the game rules and make the terms bear some relation to the situation they depict so that they are as self-explanatory as possible. Aside from that, he is not above writing a whole set of rules himself. *Napoleon at Waterloo* is an example of Simonsen's rule writing.

The point is that Simonsen's work will probably remain unsung. To say that he did the graphics in a given issue does not underscore the point that he picked the photographs (or the portions of photographs) that complemented the articles so well or that he worked out the tables, complete with the alternate grey and white bands that made legibility so easy. To say that he took a hand in rules writing does not make the point that the very concept of "semi-active zone of control" is easier to handle than "a zone of control where friendly units can only do thus-and-so." (See his article, "Gamespeak..." in *MOVES* #2).

Simonsen's role is not a readily recognizable one yet it is one which gives SPI products a unique flavor as surely as any author's style and has already had a major impact on the hobby.

## WHO'S ON FIRST?

A lot of names have been mentioned in this article. The connections between many of the people involved in the development of historical games has been left unexplained. Here we will start at the beginning (time wise) and work forward as the names appear.

In the beginning there was *CHARLES ROBERTS*, who founded Avalon Hill in the late 1950's and published the first historical simulation games. He knew *THOMAS N. SHAW* from High School. Tom Shaw joined Avalon Hill a few years after its incorporation as a game designer and product development man. Tom hired *LINDSLEY SCHUTZ* as an assistant. Schutz did a lot of the historical "checking" and answered mail etc. After AH went bankrupt in 1963 only Shaw was left on a full-time basis. Schutz was there part time for a while. Shaw then hired (for the Summers of '64 and '65) *LAWRENCE PINSKY* (a local student) who brought along sundry friends to help him out. These people (Shaw, Schutz, Pinsky and assorted friends) designed all AH games from 1964 to '66. Meanwhile *JAMES F. DUNNIGAN*, recently out of the army and attending Columbia on the GI Bill, wrote AH a few nasty letters commenting upon the inaccuracy in their games. At the end of '65 Dunnigan also published a monograph on the Battle of the Bulge which blew apart any claims to accuracy AH's game of the same name had. Shaw was looking for a new (or simply *any*) game designer and was also well aware of the lack of (and compelling need for) historical accuracy in AH games. He met Dunnigan in early '66 and at the second meeting asked him to design *Jutland* for publication in early 1967. During 1966 *CHRISTOPHER R. WAGNER* decided to start *S&T* magazine. He had seen Dunnigan's monographs on the Battle of the Bulge and wrote him asking for permission to use some of his material. This got Dunnigan involved with *S&T*, which was first published in early '67. About this same time *PHIL ORBANES* was starting up the Gamescience Corporation. He, like Wagner, subscribed to the *General* (Dunnigan received a "lifetime" subscription in early '66). There he found out about *S&T* and, as the *General* didn't take ads he got in touch with Wagner. Wagner, in turn, put Orbanes in touch with Dunnigan. This is how Dunnigan and Orbanes came to work together. *REDMOND A. SIMONSEN* also subscribed to the *General* (for a short while, anyway) and eventually found out about *S&T*. He got in touch with Wagner and was finally introduced to Dunnigan. Dunnigan introduced Simonsen to Orbanes (can you follow all of that? Does it really matter?)

Two *General* subscribers, *LOU ZOCCHI* and *DAVE WILLIAMS*, also designed games. They got no response from AH and turned to Orbanes of Gamescience (which looked like some real competition for a while). Orbanes put both of them in touch with Dunnigan (who by this time, in 1967/68, was "resident game expert" for both Avalon Hill and Gamescience). Zocchi had his *Battle of Britain* game published

through Gamescience in early '68 (at the same time Dunnigan's *1914* was published by AH). At this point AH decided that Dunnigan was a "flash in the pan" and decided to try someone else. Ironically enough, when Dunnigan finally got AH to admit this he put them in touch with Dave Williams. The result was *Anzio*.

At this point the scene shifts to other places. Dunnigan retired to his Lower East Side stronghold and got started planning what would eventually become Simulations Publications. In early '69 *Anzio* was published and almost immediately AH realized they had a lemon on their hands. At the same time Wagner was watching *S&T* go under (partly because of a co-op distribution deal with AH which went sour at great cost to *S&T*). In the Summer of '69 Dunnigan (with Orbanes handling some of the technical details) took over *S&T*. The original Gamescience had been all-but-destroyed when it was bought out by Renwal Products (they make plastic models). They completely mis-managed Gamescience and, eventually, killed it as a going concern. Orbanes left shortly thereafter to work for a game-distribution firm. In early '72 he came to work for SPI. Between late '69 and early '72 Dunnigan got together the crew that now runs SPI (just look at page 2 for the cast). In early '70 AH came out with *Kriegspiel* (another loser) designed by AH's Tom Shaw. AH had a bad year in 1970, 1969 wasn't so hot either. Although about 33% of their sales were non-wargames they depended on new wargame sales to keep them moving. After *Anzio* and *Kriegspiel* they needed some new blood. Dunnigan and Shaw still got along quite well on a personal level, and the success of the "new" *S&T* encouraged Shaw to get permission from HIS boss (*A. ERIC DOTT*) to get another game from Dunnigan.

At this point it would be a good idea to explore the internal "politics" of Avalon Hill. In 1963, when AH went bankrupt, it was "taken over" by the two companies it owed the most money to. The senior of these two "partners" was Monarch Services. Monarch was run by A. Eric Dott, a rather successful Baltimore businessman. The "junior" partner was the Smith box company. Monarch did the printing, Smith made the boxes and assembled the games. Monarch (Eric Dott) ran Avalon Hill, with Smith having a veto over major decisions. To get anything done Tom Shaw, the man who ran AH on a "day-to-day" basis, had to go through Dott. Eric Dott had a lot of other things to do and often decisions were not made, or made without the benefit of the best information. This problem has plagued AH to this very day (although recently Dott bought out Smith's interest in AH and is taking a more active role in running the company). In early '71 AH decided to buy an SPI game (Tactical Game 3) and re-publish it as *PanzerBlitz*. SPI would handle ALL the work. All AH would do would be to print and sell the game that SPI produced for them. Because of an old promise, Dunnigan is more or less committed to supplying AH with one game a year. This is why AH still gets games from SPI, even though the two are competitors. As of mid-'72, that who's on first.

(continued from page 20)

best of the zines frequently suffer from wordiness and lack of critical analysis. However, considering that the zines are produced by people working at it part time and on limited budgets, it seems fair to say that they have reached their real level of quality. Few will get better without becoming true commercial ventures and many mediocre ones will still be seen.

At this point it becomes difficult not to blow ones own horn. The fact is that during the past three years S&T has had an ever-increasing influence on the hobby. Whereas, prior to 1969, zines emphasized perfect plans and variants, there are now a growing number of articles on military history and the like. Articles are compatible, not subordinate to the games. Even games were published in the zines. All of this has been since S&T adopted that very format.

Dunnigan changed the emphasis from his first issue. The subtitle "A Journal of American Wargaming" was abandoned with issue 18. The historical article appeared immediately, followed by the military analysis article. This style shift may have been pre-mature in terms of the carry-over readership. A number simply didn't like the new format and dropped out. There was a period when S&T was like Carroll's Red Queen, running as fast as it could just to stay in the same place in its circulation.

A second change wrought by S&T is in the games themselves. First there was the volume produced both in the magazine and in the Test Series Games. Almost at a stroke the number of games it took Avalon Hill eleven years to put out was doubled. Second, the idea of a pat formula was rejected. While some concepts naturally generate a series of games, such as the *Kursk - Battle of Stalingrad - France '40 - Moscow Campaign* series or the *Tac 14 - Centurion - Phalanx - Dark Ages* series,

the basic idea remains that different systems are used for different situations. The fact that history does repeat itself allows several games to be designed on the same system.

This second change had a direct impact on the hobby. Terms created for S&T's games became accepted in general usage (with a few exceptions, such as the persistence of "square" to describe a hexagon). In part this was furthered by Avalon Hill still turning to outside designers and fixing on Simulations Publications Inc., to do a series of these games.

Actually, Avalon Hill tried to break its own mold. *Kriegspiel*, a critical failure among wargames, was this attempt. The primary purpose behind *Kriegspiel* was a venture into the bookcase type of game and to see whether a wargame could succeed in that format. In fact, it proved that point even if the hobbyists didn't particularly like it. *Kriegspiel* was the

### THE 'ZINES

Over the years since the introduction of the *Avalon Hill General* in 1964, there has been a remarkable proliferation of magazines and newsletters devoted to the wargaming hobby. The current issue of *The Guide to Wargaming Periodical Literature* lists forty such, ranging from amateurish, spirit-duplicated club newsletters, through high quality professionally printed sophisticated amateur publications such as *Panzerfaust*, *Spartan International*, *International Wargamers*, and *The General* itself, and ending with the professional *S&T* and its spin-off, *MOVES*. There has been a steady turnover in the ranks of these publications, as older

ones die out for lack of interest, to be replaced by newer ones. Several 'zines supposedly published by clubs are actually labors of love of one or two individuals, such as *D-Elim*.

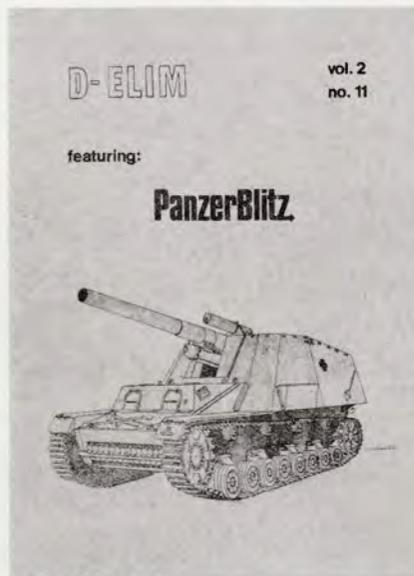
A recent trend in wargaming 'zines is magazines which might be termed "thematic" publications focusing on a single period, or even a single year, or single game, such as *The Barbarossa Bulletin*, dealing with the game of the same name; *Fusilier*, dealing with the Napoleonic period; and *Europe '44*, dealing with events in Europe during 1944. In addition, and to some extent partially outside the "wargaming" hobby are the *Diplomacy* 'zines, such

as *Graustark*, *Erewhon*, and *Atlantis*, and *Origins* 'zines, such as *Anschluss* and *Freedonia*, devoted to playing out entire games through the pages of the magazines in question.

In addition to the increase in the number of 'zines, the physical and editorial quality of the publications has also improved. Thus, *The General* for a considerable time looked more like a newspaper than a magazine, and was printed on cheap paper with very few illustrations, no real format, and no color. Issue 1 of Volume 3, out in May 1966, introduced a more magazine-like cover, with a colored border and an illustration but had even fewer interior illustrations. With



*The Avalon Hill General*, Vol. II, No. 2, (July 1965). Typical of the early issues of the pioneer wargaming 'zine.



*D-Elim*, Vol. II, No. 11 (October 1971), one of the better quality spirit duplicated "club" 'zines, of which there are several dozen in print at any one time.



*The Avalon Hill General*, Vol. VIII, No. 6, (March 1972). Indicative of the considerable improvement in physical quality that has occurred in this publication.

only wargame designed completely by Shaw. This is ironical since he did have a hand in a number of the important successes of Avalon Hill and deserves more credit than *Kriegspiel* brings him among wargamers. He took the matrix system he had developed for *Football* and *Baseball Strategy* and adapted it to resolve combat. This concept presented a major change from anything that had been used before, since it required no die. It is curious to note, in passing, that nothing has been done to develop this concept further since it does add the very realistic element of a choice on both sides contributing to the outcome of combat.

When *Kriegspiel* failed to be a success among wargamers, Avalon Hill found itself in a bind of its own creation. *Kriegspiel* was not a hard game to design, as such games go. Avalon Hill did not have the manpower or facilities to design a large, more complex game. In essence, they could no longer enjoy the option of doing their own game design when they

wanted to — they had to farm it out. The more complex game requires more man hours in its design. For one man to do it takes a long time. A team can cut the time to a fraction. The result is that the next games in their series, *PanzerBlitz*, *Luftwaffe*, *Origins of World War II* and *France '40* all not only came from an outside designer, but specifically from the S&T/SSG/SPI complex. *Luftwaffe* had been designed by Louis Zocchi but was already published as one of the Test Series Games. As a result its problems were known as it had been "playtested" by the buyers. *PanzerBlitz* and *Origins* are both Dunnigan's creations somewhat reworked and *France '40* is an improved version of the game which appeared in *S&T*. Thus, while Avalon Hill might deny it, the fact remains that Avalon Hill is in the thrall of SPI.

The shape of the second generation is clear. It is a period in which the hobby will now grow toward maturity, moving out of being purely a

a juvenile pastime into something with more prestige. Moreover, it is a time when wargamers can honestly look forward to games being reasonable duplicates of historical situations such that the player cannot merely make use of his twentieth century knowledge but must vie with the same conditions that hampered Marlborough or some other general.

Obviously, prognostication is difficult. The second generation has not peaked and it is not possible to state whether there will be a third generation. SPI's current growth rate indicates that the top is not in sight. Where the future lies depends on how big the hobby can be. If it is big enough, we may see the giants, such as Parker Brothers or Milton Bradley, getting into serious wargame design. That would change the whole picture.

Perhaps the most interesting question to be answered is the one posed by Spartan International. That club has the avowed goal of

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volume 4 number 4, out in November 1967 *the General* went over to coated stock, while still keeping interior illustrations to a minimum. This has been the format ever since.

Editorially a number of changes have occurred. The first issues of *The General* had "Regional Editors", each supposedly recruiting articles from his area. The early articles were on such topics as "Waterloo — A Defensive Strategy," "LeMans Chance Table," and "Hints for Stalingrad." Most of these articles ran no more than 1,200 words, and usually much less than that. The more recent issues have somewhat longer articles, often pompously

titled, "Simulating the Art of War," or more obscurely, such as "Operation Morgenstern," but also many of more direct wargaming application, such as "1914 Strategy and Tactics" and "Stalingrad: The Middle Game." A regular feature has been the "opponents-wanted" page and the contest, in which a wargame problem is presented to the readers, and they are asked to propose solutions using standard PBM (Play-by-Mail) techniques. almost every issue also has a question and answer column, where rule hang-ups are examined and clarified.

*Panzerfaust*, *International Wargamer* and

*Spartan International*, the longest surviving "amateur" club 'zines, have all acquired a semi-professional appearance and contain articles likely to be of interest to a wide variety of readers, rather than just club members. Thus one may find more or less complete games, such as "Space Centurions" (*Spartan International*), game related articles, such as "German Defense in Anzio" (*Panzerfaust*), and historical articles, such as "Small Arms of World War II" (*International Wargamer*) along with club news and gossip. As in Science Fiction Fandom, the 'zines play an important part in keeping the wargaming hobby alive and growing.



*Panzerfaust*, No.52 (March 1972), *International Wargamer* (January 1971) and *Spartan International* (November 1970), a sampling of the three best quality major-club publications in offset.



## THE CLUBS

The rise and development of the clubs is an event worth recounting in itself. This is due, in part, to the fact that the clubs are both the most visible and most organized part of the hobby.

The nationwide club was a virtual impossibility prior to the advent of *The General*. This is, as has been noted elsewhere, due to the fact that there was no real means of knowing who was interested in the hobby short of some newsletter. To be sure, there were local clubs, particularly at colleges and universities, but beyond that no formal organization existed.

It is interesting to note that clubs grew and developed in a manner not unlike a child. Thus, when speaking of the immaturity of the early clubs, the analogy is particularly pointed if viewed over the long haul.

It is generally conceded that the first national wargame club was S.P.E.C.T.R.E., obviously named after the then-popular Ian Fleming organization fought by James Bond. In this case the initials meant *Special Efficacy for Counter-Espionage, Revenge and Extermination*. S.P.E.C.T.R.E. formed in the spring of 1965, a year after the first issue of *The General*. Before that there were local clubs, early examples in the play-by-mail field being the *Avalon Hill Wargamers PBM League of Huntington, Indiana* and the *Tactics and Strategy Club of California*. But somehow, the idea of S.P.E.C.T.R.E. caught on and it clearly outdistanced the smaller clubs. Donald Greenwood, who has been highly visible among the hobbyists, both as publisher of *Panzerfaust* magazine and as a player himself, carved out his own niche at this time. He has noted that the filling of the "ranks" (all clubs seem to have a need for ranks, the more martial the better) was on a first come, first served basis. S.P.E.C.T.R.E. command was loosely based on the game *Tactics II* in that there were army group commanders, army commanders, corps commanders and so on. Greenwood got in early enough to be an army commander. The looseness of the selection of officers reflects the general nature of the early clubs. S.P.E.C.T.R.E. charged no dues and offered no services to the members. It was simply the 'ego trip' of being in a club which claimed, rightly or wrongly, to have the best players going.

As fast as S.P.E.C.T.R.E. announced its importance, rivals organized to knock it down. This opened the major phase of the early history of the clubs: "world conquest." The technique was one step better than the classic announcement of an ability to "lick any man in the house." A challenge would be put out that a given club "owned" a given state unless someone defeated the club and proved the contrary. Moreover, when one club seemed to be of importance, the rival clubs would seek members on the grounds that the "menace" of the other club had to be stopped. It had all the elements of a Moslem *jihad*. As fast as S.P.E.C.T.R.E. was organized, a club called *World Conquests, Inc.* was calling for a holy war to stop "the menace" of S.P.E.C.T.R.E.

In mid-1965 there appeared to be two directions that the clubs were taking — those oriented toward World War II, which took such names as *1SS Panzer Korps*, and those oriented toward the American Civil War, which called themselves such names as *Confederate Army of Central Pennsylvania*. There were, too, a few which used acronyms, such as S.P.E.C.T.R.E. and DUSK (*Der Uberlegen Siegreich Kommando*). It was in this period that the clubs can be considered as embarking on their most immature phase. Greenwood aptly refers to clubs of this period as "warring" clubs, to distinguish them from the present "wargaming" clubs, which he considers to be more hobby oriented.

Some efforts were made to add maturity to the hobby, notably the *Avalon Hill Intercontinental Kriegspiel Society* (AHKS) which had a minimum age of 25. Unfortunately, they found out that youth has no corner on immaturity.

There is some reason to doubt that many games were ever played to completion by these clubs. Unblemished records were maintained over a large number of games by the simple expedient of abandoning a game when the tide ran against you, thereby being able to say that you hadn't lost. Few games had only one side claiming victory during the period 1965-68. The pages of *The General* provide a microcosmic view of it all. Appearing bi-monthly, only the major twists and turns were apparent and they became laughable as one club would declare that it controlled an area, a second that it controlled the same area by virtue of having beaten the first club, and a third that it controlled the area, was neutral and hadn't been beaten by anyone.

Probably the most disquieting aspect of it all was the general drift toward German club names and, most specifically, Nazi-oriented names. This tended to be complemented by a general attitude in keeping with the name. Thus, while the early clubs such as DUSK soon lost the original sense of their name and while a name like *1SS Panzer Korps* is fairly innocuous, by 1967 one saw *Wehrmacht III, Gauleiter of San Francisco, 4th Reich* (as well as *3rd* and *5th* at various times), *1st SS Der Totenkopf SS, Kampfgruppe Pieper* and, still later, *Leibstandarte SS, Panzer Lehr, 1st SS Raumsturmgeschwader der Totenkopf SS, 9th SS Volksgrenadier, Fuhrer Escudrille, The Gestapo, Deutschland Uber Alles* and others of the same ilk. One never got as far as *Konzentrationslager Auschwitz*, but that may have been for lack of time. This is the aspect of the hobby that both Charles Roberts and Thomas Shaw, to name only a very few, found repulsive. Certainly it did little to advance the reputation of the hobby.

The constant nonsense of "conquest of states" began to pall as the members got older. Two organizations began to attempt to sort the matter out. The older would appear to be one originally known as *United States Continental Army Command*

(USCAC) which later changed its name to *International Federation of Wargamers (IFW)* and the other, approximately a half year later, being *Spartan*, now *Spartan International*. Both were interested in bringing a little order to the chaos. It is difficult to assess when USCAC determined that this would be a main feature of its efforts but it would seem a reasonable assumption that it did so after *Sparta* since USCAC/IFW has always been more loosely run. *Sparta* is the creation of Russell Powell and, until recently, had been almost a personal fiefdom. It was founded on the idea that the hobby needed a better image and could only gain it if the clubs pulled the hobby up by its bootstraps. IFW, on the other hand, does not appear to have had the same relentless sense of mission behind it. The major move these clubs made, which allowed them to rise above the pack, was to eliminate the warring aspect and return to a hobby. Secondly, they offered services to the members — a newsletter (in fact, a number of newsletters aimed at different phases of the club) and listings of opponents wanted as well as organized tournaments and conventions.

These two clubs were and remain a study in contrast. As mentioned before, *Spartan International* was the creation of Russell Powell. It was primarily through his fixed idea of where the hobby should be and his relentless insistence on reaching that goal that *Spartan International* grew. Obviously, such a rigid approach brooked no major dissent and this, in part, explains the fact that the IFW is the larger of the two. Whereas *Spartan International* will go out of its way to eliminate aspects of the hobby which it believes detrimental (notably the idea of "conquest"), the IFW is more loosely controlled. There are personal attacks which appear even today in the IFW publications recalling the "glory days" of vitriol. *Spartan International* would not consider printing such remarks.

Powell, as the sole head of *Spartan International* has presented a more visible target than any individual in IFW. The IFW has not only changed leadership frequently, but even moved its center of operations from the east coast to the midwest.

At this point, these two clubs set the pace for the organized aspect of the hobby. Powell has the expressed goal of stepping up that pace even higher by trying to convert a rather formless hobby into an internationally accepted sport. This is a feat of no mean proportions. Perhaps the analogy is better suited to games such as bridge or chess, rather than a physical sport, though Powell speaks in terms of the purses golfers obtain for their efforts. To this end he has adopted an Olympic-type scoring system and probably has come as close as anyone to date in creating a uniform scale for evaluation of wargame players. Whether Powell's idea is the one which will ultimately be adopted and, indeed, whether the hobby will achieve even a fraction of his goal is impossible to predict, and ultimately, may not even be important.

## THE CONS

In addition to taking the idea of fanzines over from Science Fiction Fandom, wargaming has also adopted the convention, shortened to "Con." The idea for a convention seems to have developed almost as soon as the first issue of *The General* made wargamers aware of their considerable numbers. To date, a number of wargaming cons have been held.

Most of the cons which have been held were primarily one-club affairs, such as the annual *Mil-Con* of the *Military Strategy Confederation* of New York or *Sparta's* annual *Eastcon* at the battleship *Massachusetts*. Others are primarily regional, such as the annual Lake Geneva affair, which originated as an *International Federation of Wargaming* con for Michigan and the Central U.S. Recently, however, serious efforts have been undertaken to promote a true "national" con, with all the trappings of the various national and regional Science Fiction cons.

John Mansfield, prominent in both SF and wargaming fandom recently held a con in Calgary, Canada, which ran over a weekend and included, in addition to the usual run of old war movies, displays of model aircraft and miniature soldiers and marathon game playing, a series of conferences on military history and game design. Other groups are not far behind. The *IFW's International Game Show*, scheduled for July 22-23 1972, promises to be somewhat similar to Mansfield's program and the end is not in sight.

There has not, however, as yet been a true "national" wargamer's convention, with participation by all the major clubs, held annually on a rotating basis such as the SF cons have been doing for thirty-odd years now. One of the reasons for this, of course, is that the hobby has yet to coalesce and mature. By the end of what has been termed the "second generation," or the period of wargaming clubs, this maturity will probably have arrived. After all, the beginnings of SF fandom were in the early twenties but the first "Worldcon" was not held until the eve of World War II.

(continued from page 23)

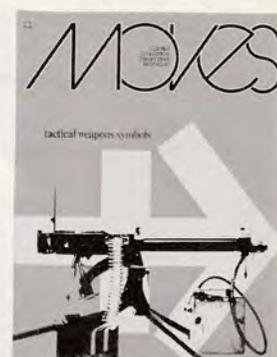
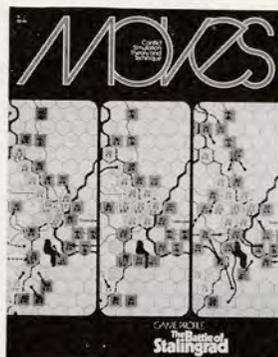
making wargaming an acceptable hobby on a level of popularity and profit equal to golf (they prefer to call wargaming a sport, rather than a hobby, though the difference is not that great in this case). Before dismissing that as a foolish notion, one need only know that bridge, in the twenties, was nothing but idle sport for bright young college students. Then along came contract bridge and now men pay for the privilege of playing with the bridge master. Thus, whether this hobby can gain enough acceptance to leave the field of "children's games" where it is too often put, remains the most provocative question to be answered. Perhaps the best summary of how things look from the present to the future is: stick around, you ain't seen nothin' yet.

— Steven Patrick



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