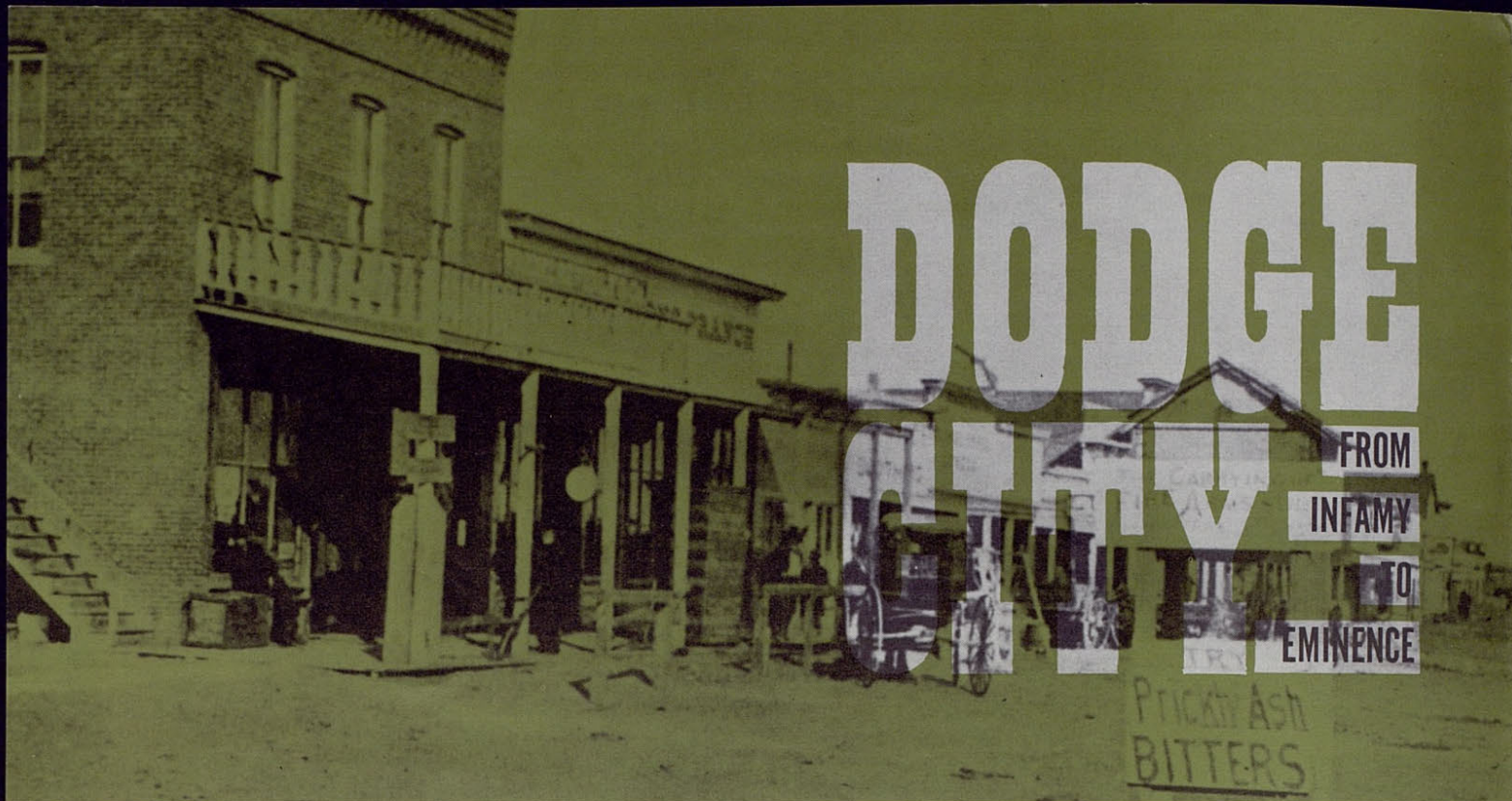


The



Spring, 1961





Time is a balm that heals all wounds. And time has been kind to Dodge City, Kansas — once the wildest town in the Wild West.

From its beginning in 1872, Dodge City has run the gamut of lawless notoriety to a mellowed, peaceable behavior akin to godliness. So complete has been the transformation of her character that the west central Kansas town of 13,000 today boasts one of the highest churches-per-capita ratio in the nation.

Dodge is proud of her churches. She is proud of her people, her progress, and her promise for the future. As for her past, she feels she has nothing to apologize for. Her lawlessness was a product of a spirited time when spirited people were meeting the challenges of a new area and a new era.

While Dodge City is concentrating on the present, its past can not be forgotten. Mementos of those infamous early days can be found in the brick and cement of several memorial statues. Beeson Museum boasts one of the finest collections of western relics in the state. Giant cattle feeding pens near the edge of town are reminiscent of the early cattle industry. A replica of old Front Street — where surely the ghosts of Wyatt Earp, "Bat" Masterson, Luke Short, "Doc" Holliday, Charles Bassett, and Bill Tilghman walk silently each night

— has been constructed as a reminder to tourists of the town's historic past.

Much more of the past has been brought to life by the marvels of modern electronics. Television has spread the fame of Dodge City through its portrayals of Earp, Masterson, and the fictitious characters of "Gunsmoke." Unauthentic though many of the productions may be, they nonetheless tend to point up the fibre in the character of Dodge City pioneers. Fiction often holds sway over fact in Hollywood versions of history, but official city records hold as unchallengeable evidence the heroic deeds of many in restoring law and order to the new frontier.

In the four hitches Wyatt Earp served as a lawman in Dodge, records reveal he killed only one man. Those who came to know the humiliation of his "buffaloing" — a practice of laying the barrel of his Buntline Special along side the culprit's head with considerable force — found it an effective persuasion to toe the line rather than to draw against the lightning-fast marshal.

It seemed that from the time A. A. Robinson and a party of surveyors staked out the Dodge City Town Company site at the junction of the Arkansas River and the 100th meridian in July, 1872, the new town was destined to carve its niche in the annals

COVER STORY

- Cattle have been a big factor in the life of Dodge City, Kansas. They made up the town's early economy and were indirectly responsible for creating a bad reputation for the area. But time has brought not only an improvement in the quality of cattle, but in the character of the city — now a quiet-but-thriving community of more than 13,000 people. Our cover photo shows a small portion of the 40,000 head of cattle that annually pass through Dodge City feeding lots.

of western history. The Santa Fe Trail passed through the site that also marked the western advance of the Atchison, Topeka and Santa Fe Railroad. Buffalo hunters abounded in the area, and for them, the railroad brought a means of shipping an estimated two million hides before the herds were decimated.

Dodge City grew rapidly in popularity and those who followed the buffalo hunters represented a heterogeneous makeup of merchants, freighters, gamblers, dance hall girls, homesteaders, gunslingers, and the tenderfoot.

In less than three years after the town was founded, the first of the great cattle drives reached the outskirts of the village. With them came thousands of cowboys, weary and saddle sore from long months on the trail. Flushed with cash from their first paychecks in months, they sought diversion where they could find it. This was not too difficult,

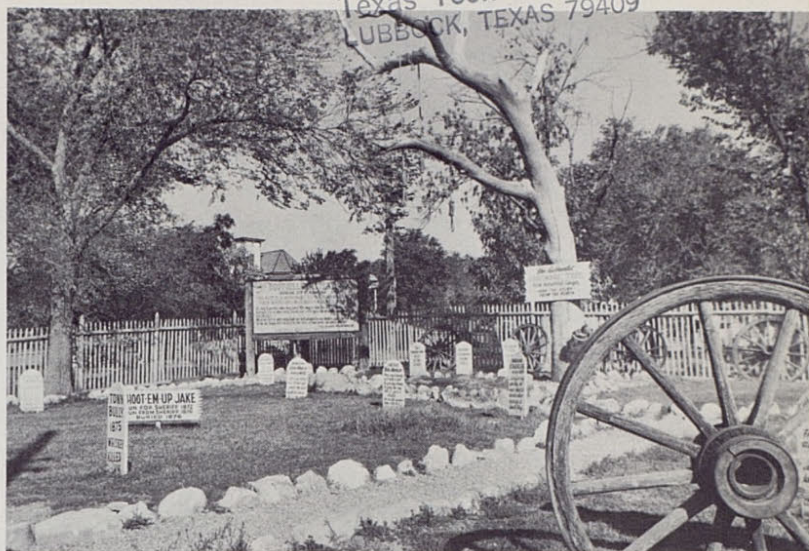


considering they could get no further than 100 yards from a saloon and stay within the city limits.

It was this breed of hardy wranglers — many from Texas — that swelled the city jails and lent credence to the city's reputation for wildness. Some, unfortunately, found one-way trips to Boot Hill, a plot of high ground set aside for burial of those who "died with their boots on" in Dodge's many gun frays. A hanging rope was often the ticket to Boot Hill for convicted horse thieves. More often than not, the victim's boots served as a pillow for his head and a simple wooden plank marked his crude resting place.

The past and present are shown in these photos. Top right is a replica of Boot Hill Cemetery. In the center is the original Dodge City Peace Commission consisting of, front row left to right, Charles Bassett, Wyatt Earp, Frank McLain, Neal Brown. Back row left to right, W. H. Harris, Luke Short and Bat Masterson. They restored law and order.

SOUTHWEST COLLECTION
Texas Tech University
LUBBOCK, TEXAS 79409



Dodge City took its name from Ft. Dodge, a nearby military post established in 1865 to protect Santa Fe Trail travelers. The post was abandoned by the military in 1882 and the reservation was opened for settlement in 1886, giving further impetus to the settlement of the territory.

The town's first year was an eventful one. Boot Hill gained 25 permanent residents, a toll bridge was built across the Arkansas, and the town's first school was established. Ford county was organized.

Union church, the town's first, was built in 1874, and in 1875 Dodge City was incorporated as a third class town.

The following year — 1876 — was another eventful one. William Barclay "Bat" Masterson was elected sheriff of Ford county (by three votes) and Wyatt Earp began the first of his four hitches as a Dodge City law officer. He was appointed assistant city marshal in May of that year and de-



parted on September 9, 1878. He had served the city on four occasions and four times he had restored law and order.

Despite its growing reputation for rowdiness, Dodge City boasted a sufficient number of sound citizens to continue its pursuit of an orderly growth and development. Boot Hill was ordered closed to further burials in 1879 and the remains of 27 bodies were moved to a newly-purchased one-acre potters' field — Prairie Grove Cemetery. A new school house was built on the original Boot Hill site and later — in 1929 — the present city hall was built there.

A group that probably brought the city as much acclaim as its array of fearless marshals and sheriffs — the Dodge City Cowboy Band — was formed in 1881. It is still active after 80 years.

An incident that brought Dodge a great amount of notoriety was the United States' first and only bullfight, held there on July 4 and 5, 1884. Mata-

dors from Mexico were brought to Dodge City and staged one of the biggest holiday celebrations the town had ever known.

Bull fights were, of course, illegal in the United States. But despite protests from humane societies, church groups, some private citizens, and some law authorities, plans for the fight were formulated and matadors were imported. By the time word of the event reached the governor's mansion in the state capital, the two-day celebration was over. It was too late to do anything about it.

Only one bull was slain in the course of the fight as most of the longhorns used refused to cooperate with the matadors. But several thousand people — many of whom traveled a great number of miles — were content with the fact they had witnessed the only bullfight ever held on U. S. soil.

As was the case in many frontier towns where water was scarce, Dodge suffered a series of serious fires in 1885. Most buildings on Front Street were destroyed, but reconstruction began early in 1886, once again reflecting the undaunted pioneer spirit of the residents.

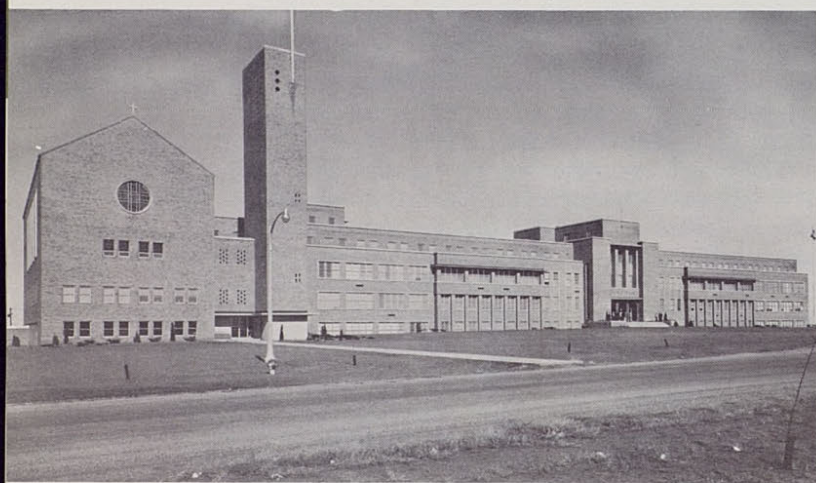
Construction has been going on ever since in Dodge City. Older buildings that have grown to be landmarks lend considerable contrast to modernistic structures that have sprung up in the last few years. Chief among the latter are several school buildings, churches, a \$760,000 municipal auditorium, and hundreds of residential dwellings.

Commercial construction has boomed in Dodge, too, much of it geared to keep pace with the rapid agricultural and industrial growth. Agriculturally, Ford county is located in the center of the world's largest hard winter wheat raising area. For a number of years since the early 1930s, the county has held the state's production record for wheat. It topped its own marks in 1952 with a yield of 8,601,000 bushels. The county also ranks high in the state in the production of grain sorghums.

The cattle industry that played such a prominent part in the early history of the city still holds sway as an important phase of the area economy. The quantity of cattle at Dodge today may fall somewhat short of the 300,000 that annually passed through the city in the early days, but there is no comparison in the quality of the stock. Six feeder lots with a combined capacity of upwards to 40,000 head keep a constant flow of choice beef to mid-western packing houses.

Those days of the trail drives, the epic deeds of fearless law officers and the wild antics of booze-crazed cowhands, the severe blizzard of '86 that nearly wiped out the cattle industry, and the bullfights of 1884 will be topics of conversation as long as there is a Dodge City.

But that talk is chiefly among tourists and patrons of western lore. Those who live in Dodge City are talking about the future.



St. Mary's of the Plains, above, is a new 4-year college in Dodge City. Below is a replica of famous Front Street.



Garden City of the West



During the period between the close of the Civil War and 1878, Southwest Kansas was a vast carpet of buffalo grass and sage brush, dotted with yucca plants. Rolling expanses of arid plains were broken by an occasional river, the only sources of water in what was known as the Great American Desert.

Settlements were few, usually scattered along the widely-separated streams. Only one significant road — the Santa Fe Trail — wound its way across the plains to afford the settlers a route to the new frontier.

It was against such drab setting that the town of Garden City came into being, considered by many as an oasis on that desert expanse.

The Santa Fe Trail in its westerly advance followed the Arkansas River. At a point known as Cimarron Crossing, the trail forked, one branch crossing the river and heading southwest toward Santa Fe and the other continuing northwest along the stream to La Junta, Colorado, then south to Santa Fe.

The town of Garden City was built about 35 miles west of Cimarron Crossing.

Two brothers, James R. and William D. Fulton, had been hunting wild horses in the area for several years. Noting the access to water and the railroad that had just arrived, they decided the spot would be a likely site for a town. They filed homestead rights on a half-section tract in 1878.

Later that year, Lucius Corse filed on the north-

west quarter of the section, but later sold his rights to C. J. "Buffalo" Jones for \$90 and a gold watch. The original townsite was platted in 1879 on the Fulton brothers' half-section, but Jones and John A. Stevens, who had filed on the remaining quarter, soon added their holdings to the new town plat.

Much of the town's progress is attributed to the friendly rivalry between Jones and Stevens who tried to outdo each other in the construction of buildings. Jones built the Buffalo Block, a building made of native stone three stories high. He also donated a block of his holdings for a courthouse and was responsible for many other commercial and residential buildings.

Stevens, to get ahead of Jones, built the Windsor Block, a massive brick building of four stories that housed the Stevens Opera House and the Windsor Hotel, still in use today.

Garden City allegedly received its name from

and more than 4,000 others live throughout Finney county.

The economy of the city is derived from a number of sources. While agriculture is the top industry, a sizeable income is realized from 25 manufacturing firms making a wide range of products. The city, located on the northern edge of the Hugoton Gas Field, also realizes considerable income from natural gas production.

Retail sales amounted to \$31,946,603 in 1959, compared to \$14,882,703 in 1950 — a fantastic 215 per cent increase in less than 10 years.

Garden City offers a variety of recreational facilities. Located here is the state's largest zoo, containing more than 400 animals and fowl, located on 127 acres of land. Kansas' largest buffalo herd roams a 3,600-acre preserve just outside the city limits.

Contrasting the lack of water for bathing facilities



the suggestion of a tramp passing through the young town in 1878. Inquiring of the town's name and learning it had none, he suggested it be called Garden City because of the many beautiful gardens and lawns. The name stuck and in 1883, Garden City was incorporated as a third class city, the seat of Finney county.

Unlike many other western towns, Garden City was never regarded as a notoriously "wild" town. Most of the settlers were cattlemen or farmers. Eventually, the cattleman gave way to the farmer after irrigation was introduced to the arid region. Today, agriculture is the basic industry of the area.

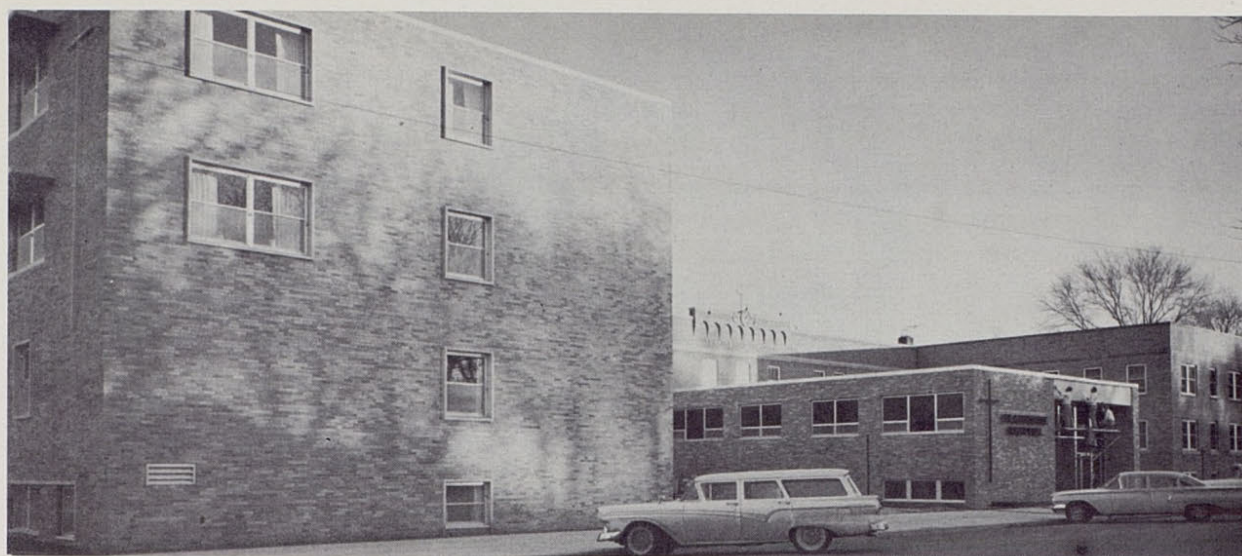
After its founding, Garden City grew steadily. As the population increased, business operations expanded, operated by men who had the success of the city in mind. Garden City today has a reputation for being one of the most progressive cities in the Jayhawk state. Its population exceeds 12,000

faced by the settlers, the city now boasts the world's largest outdoor concrete swimming pool. It covers an area of more than two acres — the size of a city block — and requires three million gallons of water per filling. And most important to Garden City swimmers, admission to the pool is free.

Sportsmen can find a haven in and around Garden City. Two golf courses are open to the public and Lake McKinney, just a few miles from town, offers excellent fishing. The area abounds in waterfowl and pheasant.

The city offers modern facilities for educating the 3,426 students enrolled in a new high school, a junior high, and several elementary schools. The educational system also includes a junior college and a parochial school.

Finishing touches are being added this year to a new ultra-modern hospital addition, financed wholly by Garden City residents. According to



Ruts of the old Santa Fe Trail, on opposite page, are still visible today east of Garden City. Above is the ultra-modern addition to the city's hospital. The shaggy buffalo, right, is one of the 400 animals housed in the city's zoo. The route of the Santa Fe Trail, below, is etched in a granite marker near Garden City. The bottom photo is a view of the world's largest outdoor concrete municipal swimming pool.



Robert Long, chamber of commerce manager, "the people of Garden City saw the need for increased medical facilities so they pledged almost a million dollars from their own pockets rather than obligate the city to a bond issue." As a result, the city now has a fully-paid hospital with a 98-bed capacity. Another hospital with 13 beds is also available for use.

Garden City boasts a four-runway municipal airport for commercial airlines; 28 churches of many denominations; two radio stations and one television station; and a city-operated public library with more than 30,000 volumes.

Garden City is proud of all her assets. But she is particularly proud of her many gardens and beauty spots.



General Grenville M. Dodge

G. M. Dodge



Dominant men and dynamic periods run together in history, reacting upon and shaping one another. So it was in the West following the War Between the States, when opportunity and that hope of success which is profit in business challenged men to risk and venture upon the greatest engineering enterprise the world had known — the first Pacific Railway. Upon its real and far frontiers, a young but seasoned, tough-fibered Yankee named Dodge was definitely the man of the hour.

Pressing American needs and the energies to supply them had been diverted by the stern necessities of national conflict. But in that hostile land for more than a thousand miles beyond the Mississippi were vast resources — soil and water, grass and game, and sometimes minerals and timber. Farther beyond was the golden lure of California, with its tidelands tapping the trade of the Orient. On the other hand, back to the east were vigorous people, strong and eager to possess these potential riches. A transcontinental railway had become a national necessity.

Among the far-sighted men who had hoped, dreamed and worked for it was Grenville Mellen Dodge. Eight generations of his line had been active in New England before his birth in Massachusetts, April 12, 1831. After a spirited career at Norwich University, in Vermont — the school that contributed more than five hundred officers to the federal forces during the Civil War — he was ready to head west. Years later he observed that whatever success he had enjoyed in life was due to his college training, the nature of which seems like a sharp commentary upon that of modern times:

"For three years," he said in speaking of Norwich, "I had drummed into me daily a respect for authority, obedience to orders, the disciplining of my mind and actions, loyalty to an employer, patriotism toward my government and honor to the flag." This was Norwich's standard for an educated man in that exacting period. Little wonder it contributed leaders to the Union forces!

By 1851, when Grenville graduated as an engineer at 20, his mind was already fixed on railroad-ing, his eyes were set upon the West. He lost little time in heading for Illinois where the Rock Island, with dreams and designs to reach the West, was starting its grades toward the Mississippi. The air was rife with the talk of rails, and hope and speculation ran high. In 1852, after a brief apprenticeship, he found himself in charge of a crew running the first railway survey across Iowa for a Rock Island subsidiary.

When this work was suspended he moved west to Council Bluffs, which he believed the most likely point for crossing the Missouri, and continued his surveys up the Platte and into the Rockies. Meanwhile the federal government, under the persistent pressure of Secretary of War Jefferson Davis, launched and completed its several surveys in search of the best route.

"It is a singular fact," Dodge remarked years later, "that the government in 1853 authorized the exploration of the country west of the Missouri River to the Pacific on four different routes, but made no mention of the most feasible route, and the one that was first built upon, known as the forty-second parallel or Great Platte route."

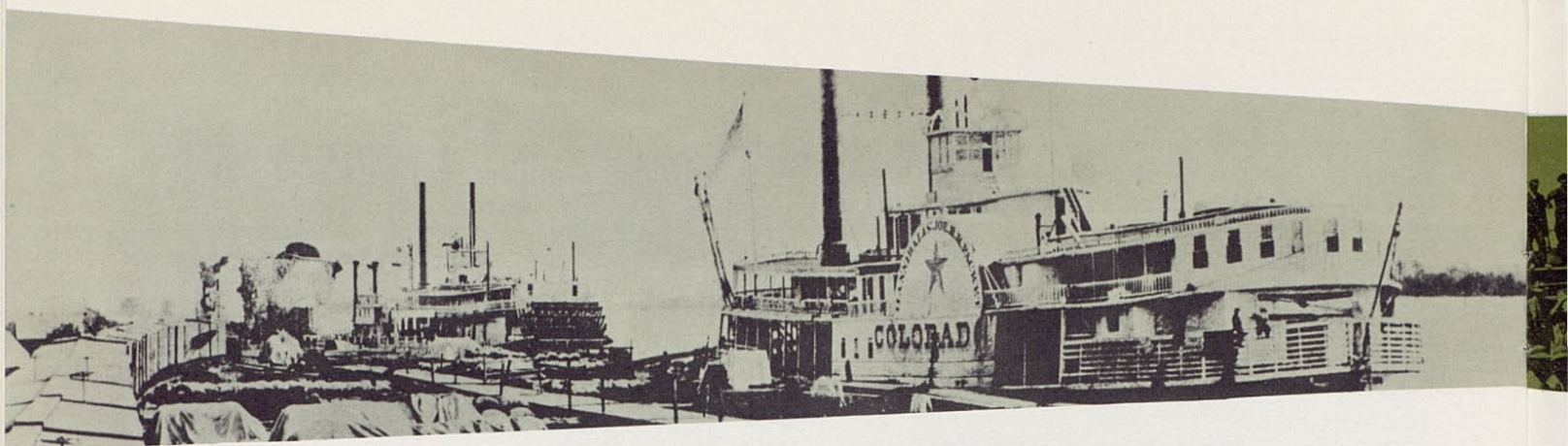
But Dodge, in his early twenties, foresaw what



BUILDER OF RAILROADS

By J. Evetts Haley

The crew of a Union Pacific construction train posed for this photo somewhere along the line in 1868.



all the experienced Army Engineers, with their command of information and material, overlooked. Chicago was bustling with business just behind him; the Rock Island had reached the Mississippi; he had run the first survey from there to the Missouri; he saw the potentialities of tapping the flat-boat traffic at Council Bluffs; the need of a crossing there; and then the logic of an already "well-defined trail . . . first made by the buffalo and the Indians, followed by the fur traders and trappers, then used by the Mormons to Salt Lake," as well as by the great overland movement to Oregon and California. It was this route that the government had overlooked, but which, with Dodge, became a consuming passion.

The depression of 1857 shut down their work. Dodge, settling at Council Bluffs to engage in business, met Abraham Lincoln when he visited there in the summer of 1859 and posted him on the advantages of the Great Platte route. Then the war broke, and Dodge, mindful of the call of "patriotism . . . and honor to the flag," left for its fields, rose to command the Department of the Missouri, was seriously wounded, and then, discovered by U. S. Grant for his genius in reconstructing vital bridges and railroads, was kept busy on special assignments until, in 1865, he was sent to put down the sweeping depredations of the Plains Indians. But even then, his mind was busy with railroad routes and grades. While desperately pressed to get out of an Indian ambush, he made his discovery of Lone Tree Pass near Laramie as the way for the Union Pacific.

Earlier, in the midst of the War, the need for linking the Union with the Pacific seemed imperative, and, in 1863, Lincoln, recalling the driving, intense young man who had mapped every water and camping place on the trail from Council Bluffs to Oregon, and had argued the Platte route with such conviction, sent for Dodge to come to Washington.

Legislation was being suggested. Dodge, always tough and tenacious in logic, argued his views: the designation of Council Bluffs as the crossing of the Missouri — the starting point of the Union Pacific; the necessity of liberal grants in land; and the subordination of federal aid in bonds to "the posi-

tion of a second mortgage." Lincoln made his recommendations to Congress and the Pacific Railroad Act of 1864 embodied Dodge's suggestions.

In the spring of 1866 General Grant gave Dodge leave of absence to become chief engineer for the Union Pacific, then a pathetic streak of rust running some 40 miles out of Omaha. Conditions could hardly have seemed less propitious. The Indians were bad, the problems of supply stupendous, the route still uncertain, the sparse land unfriendly and unyielding, and the confidence of the country in railroads all but destroyed by the scandal of the failure of that great construction firm — the Credit Mobilier.

But Dodge never looked back. He was a dynamo, a driver, and a man of decision. He demanded complete control of the operations in the field; sought and received the support of the army through Generals Grant and Sherman; hired the incomparable Casement brothers, Jack and Dan, to lay the track; and with undeviating dedication as he ruggedly lived among them, restlessly drove his crews up the gentle gradient of the Platte.

Numerous surveying parties were organized, "all armed," and all working "from daylight to dark." These were followed by "location" parties, carrying the profiles and maps of the first, laying out "a line with the lowest grades and the least curvature that the country would admit."

Behind came the construction corps, with their herds of work teams and their thousands of laborers, swarming along the line like busy ants, "grading generally 100 miles at a time," which, upon the Plains, was usually done in 30 days. But in the mountains Dodge found it necessary to set up camps several hundred miles ahead, "in order to complete the grading by the time the track should reach it." All supplies came by team from the end of track, and "the wagon transportation was enormous."

Ten thousand work animals were required to meet the needs of ten thousand laborers on the line. With no rail connection to the east, at first all supplies came up the Missouri by boat during a three-months period — when the river was high — while every mile advanced to the west added to the burden of supply. The weather was often



Steamers unload materials in Omaha, left. In the center, Central Pacific and Union Pacific meet at Promontory Point in Utah where a golden spike was driven. At right is the end of the line for the Union Pacific near Archer, Wyoming.

inclement, and hostile Indians were ever on their flanks. Yet in this vast movement organized by Dodge, there was never a serious delay for want of supplies.

Every crew was armed to the man, and under orders never to run when attacked. General Jack Casement, that spirited mite of a powerful figure from the Isle of Man, pushed his Irish paddies tirelessly, and the rails kept reaching for the setting sun. The hundredth meridian fell behind them, along with the ghosts of booming, scarlet towns, while the Plains and the Platte, and the dangerous challenge to mighty effort, reached on and on.

Julesburg, the toughest stage stand in the West, moved across the Platte to welcome them, and the town that blossomed lotus-like at the end of the line was pre-empted by the lawless. When Dodge, hundreds of miles ahead, surveying the route beyond the Great Salt Lake, got the news, he wired Casement to go back with his construction crew and straighten Julesburg out.

Casement complied. In the fall he and Dodge visited the spot together, and Dodge inquired:

"How did you do it, General?"

"I will show you," replied the doughty Casement, directing Dodge to the graveyard.

"There they are, General," he answered. "They died with their boots on, but they brought peace." And peace it was, for Julesburg then consisted only of heaps of tin cans, the station agent, the boothill graveyard, and the prairie dog towns round about. Far beyond the line pushed on.

Dodge brushed off the clamorous appeal of Denver and located Cheyenne on July 4, 1867, to become the lusty winter terminus for the Union Pacific. It swelled to 10,000 people by spring while the Casements and their irrepressible Irish builders pushed their steel toward the pass in the Black Hills, discovered by Dodge in 1865 while the Crows had his surveying party cut off and were figuring for his scalp.

During the summers of 1866 and 1867, he built

500 miles of road, fanning the interest of America to a feverish pitch. Tremendous impetus was given by the completion of the Northwestern line into Council Bluffs in December, 1867, opening rail connections to the east, thus assuring year-round supply.

With the completion of the Union Pacific to the crest of the Black Hills, beyond Cheyenne, timber and ties for the first time became available from the land being traversed—thus saving hundreds of miles of haul. But financially the road was in trouble.

Dodge gathered up his reports, profiles, maps and surveys—the proof of his favorable route across the Black Hills, the Laramie Plains, the Continental Divide, the Wasatch, the Deserts, the Great Salt Lake, and on to the California line—and headed for New York to sit down with the harried directors of the road. And Dodge, convictions always backed by determination and solid mathematical substance, was a ready advocate.

Transportation and supply were now simplified, certain, and less costly. The grades were far better than anticipated. Construction was fantastically ahead of schedule. Federal bonds were in the offing. Could they afford to quit?

The men with money believed him, dug deeper, and hypothecated their future. He left New York with sanction to build the 480 additional miles into Salt Lake, in 1868, and with plans for an additional 219 miles into Humboldt Wells in the spring of 1869, in the hope of beating the Central Pacific—the road being pushed east from California to meet them—to those prizes.

Dodge did not tarry. When his surveying party crossed the Wasatch on sleds, "the snow covered the tops of the telegraph poles." By April 1, 1868, he was with the construction crews himself, on the Laramie Plains, pushing the work toward the Humboldt Mountains. Winter caught them in the Wasatch, but they kept laying "track in the snow and ice at tremendous cost—" ten million dollars extra for that year's segment of the line. But Dodge had been told to push, despite the cost, and Dodge knew how to drive.

When the year was done he had graded 754

Continued on Page 15

Queens of the Hardwood

When a group of women college students organized a basketball team in 1948, little did they realize they were laying the foundation for one of the most famous sports aggregations in the nation. And little did they realize the appropriateness of the name they had chosen.

The Hutcherson Flying Queens of Wayland College in Plainview, Texas, seemed destined for fame from the start.

Wayland has pioneered education on the Great Plains for more than 50 years. Since it was chartered in 1908, the college has stressed the value of athletics combined with a strong academic program.

Academically, the college has made great strides. Athletically, it has attained the pinnacle of success while gaining national and international acclaim through the Queens, a team that has compiled a fantastic record of 224 victories against only 11 defeats in the last 10 years. During the past decade, the Queens have met the stiffest competition in the United States and four foreign countries.

The gallant reign of the Queens has spanned a period of 13 years during which time the girls have won five national AAU championships, posted a consecutive victory streak of 131 games, and have broken nearly every record in the AAU books. The team has produced 17 AAU All-American players.

The year after the team was organized the girls received an invitation to play in Mexico City. Claude Hutcherson, Wayland alumnus and Plainview businessman, offered to fly them there free of charge.

It was on that trip that Dr. J. W. Marshall, college president at the time, told Hutcherson the school would have to drop women's basketball if a suitable sponsor could not be found.

"I thought for a moment and then told him I would sponsor them if no one else would. And I've had them ever since," Hutcherson recalls.

No records were kept on the team until 1951, but since that time, the Queens, under the guidance of Coach Harley Redin, have continued to amaze fans wherever they have played.

The team or members of the team have played in Chile, Brazil, Mexico and Russia. The U. S. team in the 1959 Pan-American games was com-

posed of eight Queens and four members of other U. S. teams. With Redin serving as coach, the team was undefeated in the games at Chicago.

All the Queens must maintain high grade averages to play on the team, a factor that causes Redin little concern since 75 per cent of the girls were valedictorian or salutatorian of their high school graduating class.

Hutcherson, who considers the Queens "200 daughters of my own," picks up the tab for the team's travel expenses, hotel bills and meals, and provides uniforms and trophies. He estimates he has flown the girls from 10,000 to 20,000 miles per season.

Hutcherson, Coach Redin, J. G. Davis of Dimmitt, Texas, and Elvin Foster of Kress, Texas, pilot the four Beechcraft Bonanzas used on all the trips.

As it now stands, the Queens will make their final appearance at the National AAU Tournament in St. Joseph, Mo., in April. After 13 years of soaring to great heights, they are being grounded.

Ironically, it was not competition from opposition that dethroned the Queens. Instead, it was a problem of economics.

The trustees of Wayland College in January decided the burden of financing the Queens was too great to continue, despite the tremendous financial assistance from Hutcherson. It was their decision to discontinue the team as soon as the current season is completed.

A move to upgrade the academic program at the college and an anticipated enrollment crush in the immediate future were cited as influencing factors in the trustees' decision.

"It was a difficult decision to make because of the splendid cooperation we have received from everyone," said Dr. A. Hope Owens, Wayland president.

A great many fans, however, have not given up hope that a way will be found to bring the Queens back next year. Hutcherson is among those who believe financial assistance will be received in time to start the 1961-62 season.

"I think we will get something worked out so they won't be disbanded. We surely want to keep them going," he said.

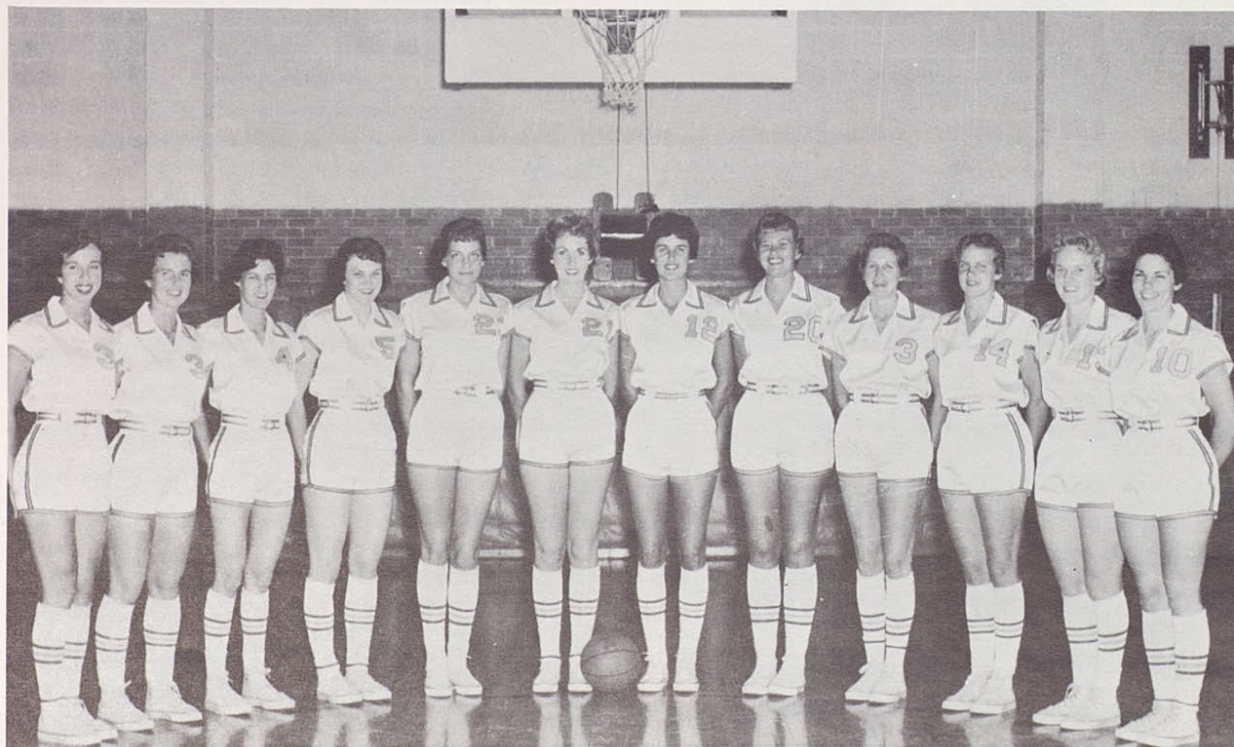
Courts



Lometa Odom was selected as All-American four consecutive years with Flying Queens.



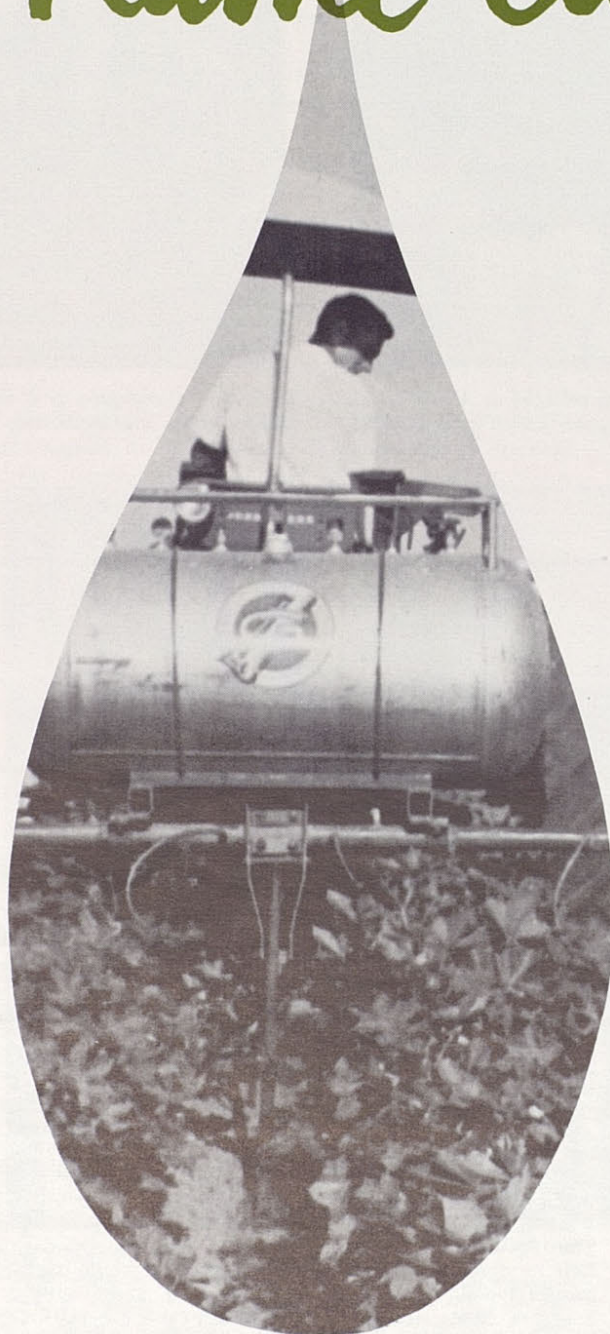
Katherine Washington is a member of the Hall of Fame and a six-time All-American.



The 1960-61 Hutcherson Flying Queens of Wayland College. Left to right are June Stewart, Betty Scott, Nelda Smith, Margie Guinn, Glenna Masten, Barbara Ransom, Marsha Scoggins, Laura Switzer, Evelyn Searles, Carla Lowry, Rose Mary Jones, and Cynthia Ann Shelton.

**PUTTING
THE
HEAT
ON WEEDS**

Flame cultivation



Weeds — the bane of the farmer's existence — are beginning to feel the "heat treatment" from today's modern agriculturists. A relatively new practice known as flame cultivation is being used as a fast and economical way to controlling undesirable growths in row crops.

Flame cultivation is not an entirely new idea in weed control. The practice was introduced about 15 years ago in the South, but had not enjoyed much popularity in the Southwest until the past two years. Now, many farmers foresee it as the solution to their problems of spiraling labor costs and labor shortages.

Not all farmers have been convinced of the merits of flame cultivation, however. There are some of the "old school" of farming who are firm in their beliefs that conventional methods of cultivation must be used to "stir the ground and aerate the soil." And there are those who believe it silly to think flame can be used to kill weeds and not harm the crops.

Experiments being conducted on different crops have proved both these precepts wrong.

Flame cultivation has been described as nothing more than selective burning. It is not intended that flaming should consume the weeds and grasses in the crop. Instead, the object is to create, temporarily, a temperature high enough to dehydrate or rupture the plant cells in weeds, thus causing them to wither and die.

Tests have shown that many crops will withstand more heat, when properly applied, than most grasses, weeds, and vines that compete for plant food, moisture, and space in the cultivated row. The amount of heat that can be applied without harm to crops is one of the factors being studied in the tests.

The High Plains Research Foundation west of Plainview, Texas, is the only organization engaged in conducting flame cultivation tests. The foundation was organized by farmers and businessmen to decide the most efficient farming methods for the High Plains area.

The results of all tests at the High Plains station are not yet complete. Yet sufficient results have

been obtained to offer decisive evidence that weeds can be successfully controlled by heat application.

Fuel used in flame cultivation is a liquefied petroleum gas known as propane. It is fed to burners placed at the side of the row to be flamed and adjusted to strike the plan at the base of the stalk. The heat is regulated by the amount of pressure applied to the burners and to the speed of the tractor pulling the cultivator. Varied speeds, gas pressures, and burner settings can be used to obtain different results. The results of these variations are being recorded in the tests at the High Plains station.

One of the main advantages of flame cultivation over conventional methods of weed control is the cost involved. Researchers at the High Plains station have found average LP-G fuel costs per acre to be 50 cents to 75 cents. Compared to costs of \$6 to \$12 per acre for hand hoeing, this represents a considerable saving to the farmer.

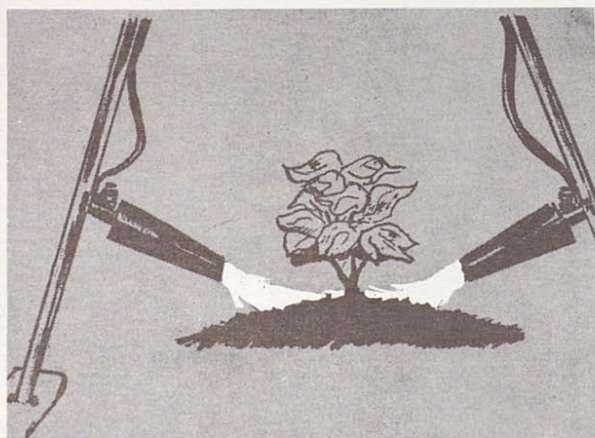
It has also been found that flame cultivators will do as much work in a day as from 30 to 40 field hands.

Though results are not yet conclusive, tests have been underway on still another application of heat to crops—drying grain sorghums in the field. Initial results of these tests have been gratifying to both farmers and storage owners.

If it proves successful, the practice will permit the harvest of grain before frost and will greatly reduce the weather hazard in farming operations.

Flame cultivation is still in its infancy, but indications are more and more farmers will throw away their hoes and turn to using flame this summer. It may be that the new practice is about to come of age.

This drawing shows how burners can be adjusted to direct the flame to the base of the plant being cultivated:



the



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miles of line and laid 534 miles of rail. By spring they were in Ogden. Shaking off the importunate demands of the powerful Brigham Young by skirting to the north of Salt Lake City, and then winning his support, Dodge drove straight on west to his major objective.

After an expenditure of nearly \$100,000,000, but years ahead of anticipation, he reached Promontory Point, 1,086 miles from the Missouri, where the lines were officially joined, May 10, 1869. From east to west the engines were nosed together, bottles of champagne broken, and the golden spike driven while the nation shouted in pride and approval. Nothing like this had been accomplished before.

Dodge resigned from the Union Pacific and in 1871 became chief engineer for the Texas and Pacific. When it failed in the panic of 1873, he joined Jay Gould in his enterprises, and in 10 years helped in building and consolidating nearly 9,000 miles of road. In the eighties he became a key figure in the construction of the Fort Worth and Denver, and finally he organized the Cuba Railroad Company and built the line from Santa Clara to Santiago.

He died January 3, 1916. His surveys alone ran to the astonishing total of almost 60,000 miles. He was successful in many fields, but the long lines of the Union Pacific—up the Platte, over the Rockies and across the deserts—were his greatest passion and pride, and are the indelible traceries to the memory of a man of character and of iron.

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