NPS Form 10-900 (Oct. 1990)

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OMB No. 10024-0018

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United States Department of the Interior National Park Service	160	and the second sec
National Register of Historic Places Registration Form		
This form is for use in nominating or requesting determinations for individual <i>Register of Historic Places Registration Form</i> (National Register Bulletin 16A information requested. If an item does not apply to the property being docum materials, and areas of significance, enter only categories and subcategories continuation sheets (NPS Form 10-900a). Use a typewriter, word processor,). Complete each item by marking "x' in the approp ented, enter "N/A" for "not applicable." For functions from the instructions. Place additional entries and	riate box or by entering the s, architectural classification,
1. Name of Property		
historic name Christeele Acres Historic District		
other name/site number		
2. Location		
street & town Roughly bounded by State Street, 900 Sou publication	th, 450 East, and 1010 South	not for
city or town Orem	vicinity	
state Utah code UT county Ut	ah code_049zip code_84	058
 State/Federal Agency Certification As the designated authority under the National Historic Preserver request for determination of eligibility meets the documentation of Historic Places and meets the procedural and professional reproperty meets does not meet the National Register criteria. I rected nationally statewide locally. (See continuation sheet the Deputy Commissioner for Historic Preservation State of Federal agency and bureau 	ition standards for registering properties in the N equirements set forth in 36 CFR Part 60. In my o commend that this property be considered signific	ational Register ppinion, the
In my opinion, the property i meets i does not meet the Nat comments.) Signature of certifying official/Title	ional Register criteria. (See continuation she Date	eet for additional
State or Federal agency and bureau		
4. National Park Service Certification A I hereby certify that the property is: Image: Signal Si	ature of the Keeper Ball	Date of Action $IZ / 30 / 99$

Christeele Acres Historic District Name of Property

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Orem, Utah County, Utah County and State

5. Classification Ownership of Property (check as many boxes as apply)	Category of Property (check only one box)	Number of Resources within Property (Do not include previously listed resources in the count.)		
🔲 public-local	🔀 district	Contributing	Noncontributing	
🔀 private	building(s)	58	7	buildings
public-State	🗌 site			 sites
public-Federal	☐ structure			 structures
	object		······································	 objects
		58	7	Total
Name of related multiple pro (Enter "N/A" if property is not part of a		Number of contrib in the National Re	uting resources pre gister	viously listed
Historic and Architectural Reso	ources of Orem, Utah	N/#	A	
7. Description Architectural Classification (Enter categories from instructions)		Materials (Enter catego	ries from instructions)	
OTHER: World War II-Era Defens	se Housing/FHA Minimum House	foundation	CONCRETE	
OTHER: World War !!-Era Cottag	le	walls	BRICK	
OTHER: Minimal Traditional				
		roof ASPHALT shingle		
۰ <u>ب</u>		other	WOOD detailing	
Narrative Description (Describe the historic and current cond	dition of the property on one or more c		uation sheet(s) for Sect	ion No. 7

Christeele Acres Historic District Name of Property

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8. Description Applicable National Register Criteria (Mark "x" in one or more boxes for the criteria qualifying the property for National Register listing.)	Areas of Significance (enter categories from instructions)		
A Property is associated with events that have made	ARCHITECTURE		
a significant contribution to the broad patterns of our history.			
B Property is associated with the lives of persons significant in our past.	INDUSTRY		
	MILITARY		
C Property embodies the distinctive characteristics of a type, period, or method of construction or	POLITICS/GOVERNMENT		
represents the work of a master, or possesses high artistic values, or represents a significant and distinguishable entity whose components lack individual distinction.	SOCIAL HISTORY		
D Property has yielded, or is likely to yield, information important in prehistory or history.	Period of Significance 1943-1940s		
Criteria Considerations			
(Mark "x" in all the boxes that apply.)	Significant Dates		
Property is:	1943		
A owned by a religious institution or used for religious purposes.			
B removed from its original location.	Significant Persons (Complete if Criterion B is marked above) N/A		
☐ C a birthplace or grave.			
D a cemetery.	Cultural Affiliation N/A		
E a reconstructed building, object, or structure.			
F a commemorative property.	Architect/Builder Groneman Brothers Contractors/builders		
G less than 50 years of age or achieved significance within the past 50 years.			
Narrative Statement of Significance (Explain the significance of the property on one or more continuation sheets.)	See continuation sheet(s) for Section No. 8		
9. Major Bibliographical References Bibliography (Cite the books, articles, and other sources used in preparing this form on one or more conti			
Previous documentation on file (NPS):	Primary location of additional data:		
 preliminary determination of individual listing (36 CFR 67) has been requested previously listed in the National Register previously determined eligible by the National Register designated a National Historic Landmark recorded by Historic American Buildings Survey recorded by Historic American Engineering 	 State Historic Preservation Office Other State agency Federal agency Local government University Other Name of repository: 		
Record #			

See continuation sheet(s) for Section No. 9

Orem, Utah County, Utah County and State

10. Geographical Data

Acreage of Property approx. 10.5 acres

UTM References

(Place additional boundaries of the property on a continuation sheet.)

1 <u>1/2</u>	<u>4/4/1/7/2/0</u>	<u>4/4/5/8/9/2/0</u>	2 <u>1/2</u>	<u>4/4/1/9/0/0</u>	4/4/5/8/9/2/0
Zone	Easting	Northing	Zone	Easting	Northing
3 <u>1/2</u>	<u>4/4/1/6/6/0</u>	4/4/5/8/7/2/0	4 <u>1/2</u>	<u>4/4/1/7/2/0</u>	4/4/5/8/7/0/0
Zone	Easting	Northing	Zone	Easting	Northing

Verbal Boundary Description

(Describe the boundaries of the property.)

Beginning Christeele Acres Subdivision Block 1, Lots 1-9; Block 2, Lots 1-15; Block 3, Lots 1-28 and Block 4, Lots 1-13. Beginning at a point 672.01 feet South and 481.10 feet East of the center of Section 23, Township 6 South, Range 2 East, of the Salt Lake Base and Meridian; and running thence South 717.93 feet; thence West 25 feet; thence South 82 feet; thence West 100 feet; thence South 60 feet; thence West 36.36 feet; thence South 125 feet; thence North 89E01N40O West 501.11 feet; thence North 17E57N West 337.90 feet; thence East 146.54 feet; thence North 487 feet; thence East 10 feet; thence North 154.27 feet; thence East 115 feet; thence North 23.50 feet; thence South 88E51N50O East 495.10 feet to the place of beginning.

Property Tax No. 36:083:001 - 36:083:008, 36:083:010 - 36:083:066 (Parcel no. 36:083:066 was originally parcel no. 36:083:009, 36:083:009 no longer exists.)

Boundary Justification

(Explain why the boundaries were selected.)

The boundaries of the district correspond to the original boundaries of the Christeele Acres Subdivision. The above legal description was taken from the plat map filed on March 8, 1943 with the Utah County Recorder. The subdivision consists of 65 individual lots whose current legal descriptions are the subdivision=s block and lot numbers. The street boundaries are as follows: beginning with the two properties facing west on State Street on either side of 1010 South, the boundary runs north along the rear of the properties facing east on 400 East to 900 South, thence east along 900 South to the line running along the rear of the properties facing east on 450 East to the rear of the properties facing north on 1010 South, thence west to State Street. See figures 1 & 2

전자 공격에 관계하는 것이다.

See continuation sheet(s) for Section No. 10

zip code 84108

state UT

name/title	Korral Broschinsky	
organization	City of Orem Historic Preservation Commission	date November 19, 1999
street & num	ber1049 University Village	telephone 801/581-1497

city or town Salt Lake City

11 Form Prepared By

Additional Documentation Submit the following items with the completed form:

Continuation Sheets

Maps A **USGS map** (7.5 or 15 minute series) indicating the property's location.

A **Sketch map** for historic districts and properties having large acreage or numerous resources.

Photographs: Representative black and white photographs of the property.

Additional items: (Check with the SHPO or FPO for any additional items)

Property Owner name/title Multiple Property Owners

street & number N/A	teleph	one_N	/A	
city or town N/A	state	UT	zip code	84097

Paperwork Reduction Act Statement: This information is being collected for applications to the National Register of Historic Places to nominate properties for listing or determine eligibility for listing, to list properties, and to amend existing listings. Response to this request is required to obtain a

benefit in accordance with the National Historic Preservation Act, as amended (16 U.S.C. 470 et seq.).

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Estimated Burden Statement: Public reporting burden for this form is estimated to average 18.1 hours per response including time for reviewing instructions, gathering and maintaining data, and completing and reviewing the form. Direct comments regarding this burden estimate or any aspect of this form to the Chief, Administrative Services Division, National Park Service, P.O. Box 37127, Washington, DC 20013-7127; and the Office of Management and Budget, Paperwork Reductions Projects (1024-0018), Washington, DC 20503.

Section No.7 Page 1

Christeele Acres Historic District, Orem, Utah County, UT

Narrative Description

The Christeele Acres Historic District, a residential subdivision built in 1943, is located between State Street and 500 East, and between 900 South and 1010 South in Orem, Utah (figure 1). The district consists of sixtytwo single-family dwellings and three duplexes on sixty-five rectangular lots. The buildings are all one-story brick structures, similar in scale and materials. Built during World War II for defense workers, the design and construction of the houses were tightly controlled. The floor plans and stylistic elements were based on the Federal Housing Administration (FHA) "minimum house" prototypes developed in the 1930s. The majority of the dwellings have four principal rooms and approximately 700 square feet of living space. While in general, World War II-era houses were stylistically plain; the homes in Christeele Acres display an unusually high degree of variety for the time period. Not including the duplexes, there are eight distinct facade treatments and several minor variations in floor plans. In addition, the houses were well constructed and demonstrate a high quality of materials and workmanship. With few exceptions, the houses and yards have been maintained and are in good condition. Out of the sixty-three single-family residences, six have been altered and are considered non-contributing (figure 2). Two of the duplexes have been converted to commercial use, one of which has been altered beyond recognition and is considered non-contributing. Other than garages, there are no out-of-period structures within the district.

Landscaping Features

The Christeele Acres subdivision was built on a flat parcel of approximately 10.5 acres. The land was originally an irrigated farm. The fields and orchards that surrounded the subdivision in the 1940s have been gradually replaced by later subdivisions to the north, south, and east, and by commercial development along State Street to the west. The University Mall in Orem, built in 1972, just two blocks south of Christeele Acres, was a major factor in the growth of retail along State Street and 1300 South (both five-lane highways). Today the landscape of Orem has been almost completely transformed from agricultural uses to shopping centers, retail stores, and other commercial use.

Despite the growth surrounding it, many of the original landscape features of Christeele Acres have been retained making it a visually cohesive neighborhood. The subdivision lots were arranged on two long streets (400 East and 450 East) with two shorter cross-streets at each end (900 South and 1010 South.) With a few exceptions, the houses face inward. The developers provided curb, gutter, sidewalks, driveways, and street paving (photograph 1). The homeowners provided their own fences and landscaping (photograph 2). The majority of lots are 55 feet wide by 125 feet deep with lots that are more square at the corners. There is a uniform 25-foot setback for all buildings. Running along the rear of each property is a 10-foot right-of-way for utilities and the irrigation system (figure 3). Many of the irrigation ditches are dirt, however some were lined with stone or cement in the 1950s (photograph 3).

Because individual homeowners provided landscaping, there is a variety of vegetation. Each house has a front lawn and most have lawn in the backyard as well. There are a number of homes with large fifty-year-old conifers and deciduous trees (photograph 4). Front yards also include shrubbery and flower beds. In the backyard, most property owners have garden plots and many have fruit trees. Fence types are mostly wood

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Christeele Acres Historic District, Orem, Utah County, UT

plank or chain link, nearly all extant fences date from after the historic period. Fences at the rear and sides of the backyards separate the lots. Only a few homes have fences separating the front yards from one another.

Residential Building Stock

Floor Plan Variations (types):

Since all of the Christeele Acres residences were based on the FHA's "Minimum House" designs, the homes are basically either square or rectangular, and of a house type described simply as the World War II-era cottage (figure 4). A few variations have a projection or notch at the side or front entry. All buildings are one story and have concrete foundations with fully excavated and concrete-lined basements. To conserve livable space, the basements were accessed via exterior stairwells of concrete construction. All houses have exterior walls constructed of brick masonry three-wythes thick. Plaster was applied directly on the interior of the masonry. Interior walls are stud walls sheathed with a form of wallboard called "rock lathe." Rock lathe was designed to be plastered and had small holes spaced every few inches (photograph 5). The roofs were asphalt-shingled with a combination of gabled and hipped-roof configurations.

The Christeele Acre residences can be most easily classified according to size. The largest are the three duplexes located near the corner of State Street and 1010 South (photograph 6). The duplexes are long rectangular structures comprising two two-bedroom houses, each approximately 650 square feet. The kitchen and living rooms are in the front with the bedrooms and bathrooms in the rear. The best-preserved example is 375 E. 1010 South, which shows one unit with the main entrance facing the street and another with an entry on the side (photograph 7). Both duplexes on State Street have been converted to commercial use (photograph 6). The duplex at 1033 S. State Street has been altered and enlarged beyond recognition and is considering non-contributing. In contrast, the alterations to 365 E. 1010 South are reversible, though it is unlikely the building will be returned to residential use.

The rest of the dwellings are single-family houses. Eight of these are three-bedroom houses of approximately 884 square feet. In general, the three-bedroom homes were built on the corner lots and are rectangular with the long side parallel to the street (photograph 8). In plan, the three-bedroom homes are similar to 1009 S. 450 East which has a kitchen and living room in front (figure 5). The "minimum" house eliminated the foyer: the front door leads directly into the living room. A hall separates the private spaces (bedrooms and bathroom) from the more public living room and kitchen. There is no dining room. The exterior basement access is either on the side or the rear of the house depending on the lot. Utilities are in the basement.

The majority of houses have two bedrooms, and range from 695 square feet to 745 square feet. Fifty-four homes are two-bedroom homes that have approximately square footprints. Most of the homes are similar in plan to 963 S. 450 East (figure 6 and photograph 10) with the living room and kitchen in front. Two bedrooms and a bathroom are grouped around a small hall in the rear. The kitchen door and basement access is on the side. Approximately one-fourth of the houses in Christeele Acres have a living room in front, a kitchen in the rear, and a back door. While the two-bedroom homes have basically square footprints, Christeele Acres has an unusual number of variations. Twenty-seven houses have square or slightly rectangular footprints. Twelve houses have a side projection and a living room bay (see figure 5). Nine have a projecting living room wing with a front-facing entrance. Six have a more pronounced projecting living room wing with a side-facing entrance.

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Christeele Acres Historic District, Orem, Utah County, UT

Floor Plan Alterations:

Alterations to the original floor plans range from the minor to the major. One of the first additions made to the vast majority of homes was a lean-to structure to cover the basement stairs. Many of these early lean-tos are extant and date from the historic period (1943-1950). The majority is frame with shed roofs and covered with siding or shingles. In many cases, owners were able to built an enclosed porch around the stairs, providing additional living space while covering the basement access. These larger structures are mostly found in the rear because of the narrow lots. These enclosed porches date from the 1940s to the 1980s, and are frame structures, with a few brick examples. In many cases, a second basement access stair was built within the interior of the house or a later addition. Approximately seventy-percent of the buildings have either no alterations or only minor alterations visible on the exterior of the house.

For the most part, families of four or more occupied the Christeele Acres houses. During the baby boom years, most families found it necessary to have more than two bedrooms. The finishing of the basement was the first solution. Nearly all the basements are at least partially finished, some as early as the late 1940s, and with a few as late as the 1990s. Another solution was the construction of an addition to provide additional bedrooms, a larger kitchen, a dining room, or a family room. Due to the narrow lots, the majority of these major additions are to the rear of the houses and do not detract from the historic integrity of the original structures. As with the enclosed porches, these additions. Four of the houses have major additions to the side and are considered non-contributing. The most dramatic alteration is found at 426 E. 900 South (non-contributing) where a second story has been added "piggy-back" to the original house (photograph 11).

House Styles:

The architectural style of the Christeele Acres homes also relied on small house designs and philosophies developed by the FHA and the architectural profession in the 1930s: the "Cape Cod Cottage" based on a colonial-style popular on the east coast. However, the ten distinct facade designs of the Christeele Acres homes show far more variations than are typically found in a subdivision of defense housing. The Christeele Acres homes have many common characteristics, but there were so many variables, that no two are exactly alike. The only ubiquitous characteristics are the brick masonry, the one-story height, the slightly raised concrete foundation (most are painted), and the three concrete steps to the small front porch.

Even though brick was used throughout, variations in masonry treatment helped support the uniformity of appearance. The houses were constructed of brick laid in a running bond with flush mortar joints. The majority of the homes used striated brick of variegated colors, divided fairly evenly between those constructed of red brick and those constructed of a yellow-orange brick. Six houses were constructed of a smooth-faced brick, which range in color from a rose pink to a dark red-brown. The brick was high quality and in more than fifty-years, no house has been painted. Brick was used for decorative details in several house styles. Many homes have brick pilasters flanking the front door (photograph 12). A few have indented brick quoins at the corners (photograph 13). Another variable is the variety of roof configurations. The houses have several different combinations of gables and hips with ridges both parallel and perpendicular to the street.

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Christeele Acres Historic District, Orem, Utah County, UT

Stylistically, the homes are all "Minimal Traditional," implying the use of minor classical or colonial elements' but there are several distinct window and door treatments. The duplexes have little ornamentation with one-over-one double-hung windows, singly or in pairs with brick sills and wood lintels (photograph 7). There are three distinct styles of three bedroom homes. Four of the three-bedroom homes are similar to 1009 S. 450 East, which has all of its original windows (photograph 9). This house also features fluted wood pilasters flanking the front door with decorative lintels (photograph 14). Two houses are similar to 384 E. 1010 South, which has drop siding around the front door and as part of the gable trim (photograph 15). One house has the NPS brick pilasters described above, and one is totally unique with a corner kitchen window (photograph 16).

The two-bedroom houses show the most variety with six distinct styles. Pairs of square-shaped windows flanking the front door are the most common (photograph 17). There are twelve houses in Christeele Acres similar to 963 S. 400 East, which has a sided bay (photograph 10). There are ten houses which feature one large square window with one horizontal window similar to 426 E. 1010 South (photograph 18). Nine houses have a slightly projecting front wing and two square window openings (photograph 19). There are seven houses similar to 396 E. 1010 South (photograph 11) with one single and one pair of double-hung windows. Most of these houses feature brick pilasters, though one variation is the use of sidelights (photograph 20). Six houses are particularly distinctive with a more substantial projecting wing and a front entry perpendicular to the street (photograph 21).

Styles - alterations:

While there are some houses in Christeele Acres that have been modified very little, approximately half of the homes have had windows replaced. However, the window openings have not been altered and many replacements are similar to the historic windows. The historic windows were two-over-two horizontal panes, and most were double-hung. Many of the picture windows featured similar horizontal panes in a fixed frame. One interesting feature of the homes was the coal chute in the basement near the stairs, on the driveway-side of the building. While the coal furnaces have all been replaced, several homes still have their coal chute doors. However most chute openings have been converted to windows or obscured by later additions. Other noticeable alterations include the addition of porch railings and posts. With the styles that had a column or post supporting the porch roof, nearly all the original porch roof supports have been replaced. Some houses originally featured a simple shed-type porch roof supported on brackets, and many of these are extant. Columns, siding, plain glass, or glass-block sidelights usually accented the surrounds of the front doors. One porch was extended and enclosed using a striated brick similar to the original. Most of the homes have newer asphalt-shingles on the roof and a few have new vinyl or aluminum soffits and fascia. In only two cases have alterations to the windows, porches and other stylistic details made the houses non-contributing.

Garages

The only outbuildings associated with the properties are the garages. The subdivision developers provided concrete driveways, however the building of a garage was the responsibility of the owners. There are eight homes with attached garages or carports, but most garages are set father back on the property than the house. Thirteen dwellings currently have no garage. Many of these homes have concrete pads and probably

¹Virginia & Lee McAlester, A Field Guide to American Houses, (New York: Alfred A. Knopf, 1984), 477-478.

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Christeele Acres Historic District, Orem, Utah County, UT

had garages at some time. Twenty-seven dwellings have garages or carports that are non-contributing. These structures include non-historic garages and carports and older garages that have been altered. The remaining twenty-five houses have garages that appear to be from the middle to late 1940s. All of these garages are single-car with a simple gable roof. However, the materials vary from striated brick (usually matching the house) to drop siding and shingles (see photograph 22).

Historic Integrity

The Christeele Acres Historic District is an excellent example of a World War II-era defense housing built by private developers. The subdivision processes features all of the characteristics of the federally mandated war housing program guidelines. Ninety-percent of homes and fifty-four percent of garages are considered contributing. The houses, garages and landscaping features of the subdivision are in good historic condition and contribute to the history of Orem, Utah.

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Christeele Acres Historic District, Orem, Utah County, UT

Narrative Statement of Significance

The Christeele Acres Historic District, built in 1943, is a neighborhood of World War II-era housing in Orem, Utah. The subdivision consists of sixty-five one-story, brick single-family dwellings and three duplexes. Christeele Acres is historically significant under Criterion A in the areas of Social History, Politics/Government, Industry, and Military for its connection to the United States involvement in World War II. The subdivision is also significant in the areas of Architecture, and Community Planning & Development for its place in the history of twentieth-century domestic architecture and suburban development. The government programs that produced World War II-era defense housing influenced several decades of post-war subdivisions. Christeele Acres is also significant to the history of Orem. The 1943 subdivision was built at the beginning of the city's transformation from an agrarian village to an industrial and commercial city. After the war, Christeele Acres was located in the middle of the city's evolution into the retail shopping center of Utah County, which occurred in the decades following the war. The Christeele Acres subdivision is being nominated under the Multiple Property Nomination, *Historic and Architectural Resources of Orem, Utah*. Christeele Acres retains a high degree of historic integrity with ninety percent of the houses being contributory to the district.

A Brief History of Orem, 1858 - 1941

Orem, Utah, is located in the center of Utah County. The city extends from the eastern shore of Utah Lake to Provo and the foothills of Mount Timpanogos. The community of Orem was originally called the Provo Bench. Bypassed by the Provo River, the bench lands were barren and rocky, and considered uninhabitable, especially in winter. Beginning in 1858, small groups of settlers attempted to farm the area, but were mostly unsuccessful until the construction of the Provo Bench Canal in 1864. At this time, there were a few farms and orchards on the bench, but no full-time residents. As the canal construction expanded and irrigation improved during the last three decades of the nineteenth century, homesteaders began to build homes as well as plant fields and orchards.

By the end of the nineteenth century, a population of 692 was living on the Provo Bench.² Most early settlers were members of the Church of Jesus Christ of Latter-day Saints (LDS or Mormon Church). Unlike many early Utah settlements, Orem was not laid out in a grid of city blocks, but as a string of homesteads along the territorial highway (now State Street) and other thoroughfares. Though these early farmers experimented with a variety of crops, fruit production proved to be the most lucrative cash crop. The first major peach crop, harvested in 1892, encouraged more settlement and agrarian expansion. In the 1890s, the small community had a sugar-molasses mill, two schoolhouses, an LDS Church meetinghouse, a blacksmith shop, a general store, and two recreational resorts.³

²It Happened in Orem, xv.

³J. Cory Jensen, National Register of Historic Places Multiple Property Documentation Nomination Form: Historic and Architectural Resources of Orem, Utah, January 1998, copy available at the Utah State Historic Preservation Office.

United States Department of the Interior National Park Service

National Register of Historic Places Continuation Sheet

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Christeele Acres Historic District, Orem, Utah County, UT

In 1910, with a population of just over a thousand, the community began to receive major improvements. Electricity reached the Provo Bench in 1912 from a power station in Provo Canyon. The construction of the Salt Lake and Utah Interurban Railroad, which stretched from Salt Lake City to Payson, gave the bench-area farmers access to a wider range of markets. In 1914 the Provo Bench Commercial Club was organized to promote better business conditions. The business leaders decided to change the area's name from Provo Bench to Orem, after Walter C. Orem the owner of the interurban railroad.⁴ The community was incorporated under the name of Orem in May 1919.

The first act of the new town was the passing of a bond election in the amount of \$110,000 to pay for a new culinary water system. Orem grew slowly, adding an average of 500 people each decade. By 1930, the population was 1,915. Agriculture continued to be the primary occupation for the majority of Orem citizens, though the economy had already began to stagnate and decline even before the depression years. Nevertheless, the town made gradual improvements during this period. State Street was paved with concrete in 1921. The entire community had electricity by the end of the 1920s. The town was enlarged by a series of annexations in the late 1930s. In 1938, the James G. Stratton farm and residence at the corner of State Street and Center Street were acquired, giving Orem its first official city center and town hall. One of the greatest achievements of the community was the establishment of the Sharon Cooperative Educational and Recreational Association (SCERA) in 1933.⁵ Though still primarily an agricultural community, by 1940 Orem had a street numbering system, a thriving commercial district along State Street (necessitating the installation of semaphores at 800 North and 800 South), and a population of 2,914.

World War II and the Geneva Steel Plant

On February 14, 1941, Utah's Governor Maw proclaimed that Orem Town had become Orem City. However, it was another event of 1941 that would change the future of Orem dramatically. That event was the Japanese attack on Pearl Harbor, which occurred on December 7, 1941. Even before the United States entered World War II, the government had been preparing for war. In May of 1941, the federal government had asked the U.S. Steel Corporation, the largest steel manufacturer in the country, to produce plans for a large steel plant to serve west coast shipyards. After Pearl Harbor, the plans were accelerated. Railroad freight lines from the east coast, where all large-scale steel plants were located, were already over-burdened, and the route through the Panama Canal was subject to closure. The best location would be inland, accessible to the Pacific Coast, but not vulnerable to a coastal invasion.

Within a few months of Pearl Harbor, on February 4, 1942, the federal government announced that Orem, Utah, had been chosen for the location of the new steel plant.⁶ The 1,600-acre site, former dairy land located

⁴The change was an attempt to curry favor with Mr. Orem, as well as give the community a name that could be used for marketing and would distinguish it from Provo.

⁵The word "cooperative" was later changed to "community." The SCERA complex is still in operation today and includes a theater, museum, playground, swimming pool, and community center.

⁶Larry R. King, *The Economic Impact and Influence of Geneva Steel on Utah County*, TMs, April 1972, available at Brigham Young University, Lee Library, Special Collections, 4.

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Christeele Acres Historic District, Orem, Utah County, UT

on the eastern shore of Utah Lake, was considered an ideal location. The area had access to natural resources and raw materials: iron ore, coal deposits, limestone, and water. Other advantages included major railroad lines and the availability of an educated and stable work force? Furthermore the steel industry already had a presence in Utah County: the Columbia Steel Corporation had been producing pig-iron at its Ironton Plant since the early 1920s.

The Defense Plant Corporation, an arm of the federal government, advanced \$35 million to begin construction of the new steel plant. Columbia Steel became a division of the United States Steel Corporation, the only entity with the knowledge and resources needed to construct and operate the largest integrated steel mill west of the Mississippi.⁸ The site was purchase on March 20, 1942, and ground was broken seven days later. The plant took twenty-two months, several thousand construction workers, and approximately \$180 million to complete.⁹ The new plant was called Geneva, the name of Orem's early lakeside resort. By the time the plant was fully operational in December of 1944, the population of Orem had increased by 186.5%.¹⁰ The job of providing housing for the incredible influx of defense workers fell on the federal government's war housing program.

Early Twentieth-Century Suburban Development and the Evolution of a Federal War Housing Program

Twentieth-century federal housing programs had their origins in the suburban development of the nineteenth century. Suburban neighborhoods were sub-urban, or not fully urban. Early subdivisions were built on the outskirts of the city and provided an upper-class retreat from the heat and grime of the urban centers. Stately homes, wide lawns and winding lanes gave the neighborhoods a pastoral quality. The developers, however, worked hard to give their developments as many city amenities as were available: water, electricity, and access to public transportation. Often called streetcar suburbs, these early neighborhoods were a refuge for the affluent businessman who took an electrified railway to work in the city and returned home to his family in the suburbs at night.

In the late nineteenth century, suburban living was seen as a panacea for the evils of the tenement-crowded city. Reformers looked forward to the day when cheap streetcar fares would enable even the poorest to surround their habitations with open spaces.¹¹ Subdivision developers, however, were not interested in creating neighborhoods for the working-class. They marketed their developments to the middle-class, a group just beginning to experience the economic prosperity which allowed families to purchase their first home.

⁷Roger Roper, "Geneva Steel," in Utah's History Encyclopedia, ed. by Allan Kent Powell, (Salt Lake City, Utah: University of Utah Press, 1992),

⁸ "Geneva Works Fulfills Pioneer's Dream," U.S. Steel News, vol. 8, no. 4, (October 1943): 2. The "pioneer" refers to Brigham Young who experimented with iron production in the 1850s in order to make the Utah Mormons more self-sufficient.

⁹History of Geneva Steel, ([n.p.: United States Steel Corporation], TMs, 1953), 40-42. See also King and Roper.

¹⁰King, 4.

¹¹Kenneth T. Jackson, Crabgrass Frontier: The Suburbanization of the United States, (New York: Oxford University Press, 1985), 117.

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Between 1900 and the 1920s, more paved roads and the affordability of the Model T helped fuel the middleclass flight to the suburbs. The bungalow, with its impression of informal living and unity to site, replaced the Victorian cottage as the most popular house type.¹² After World War I entire neighborhoods of houses based on historic styles appeared. Nationalistic pride following the war led to the increased use of Neo-classical and Colonial Revival styles. Many developers built in the English Tudor and French Norman styles favored by doughboys recently returned from Europe.¹³ These popular period revival cottages soon replaced the bungalow.

It was during the depression years when residential construction dropped by 95% that the United States government got heavily involved in the housing industry. Prior to the 1930s, federal involvement was limited to an 1892 survey of slum conditions in large cities, the creation of a Federal Land Bank System in 1916, and the construction of munitions workers housing during World War I.¹⁴ By 1933 half of all home mortgages in the United States were technically in default. Believing that home-ownership was essential to the social stability of the nation, the federal government began a series of programs aimed at the protecting the small homeowner from the arbitrary and unpredictable forces of the home-financing market. One of the most successful programs was the Home Owners Loan Corporation (HOLC), which introduced, perfected, and proved in practice the feasibility of the long-term, self-amortizing mortgage with uniform payments spread over the whole life of the debt.¹⁵

The government agency that has had the most powerful impact on the housing market in the twentieth century is the Federal Housing Administration (FHA). The FHA dates to the adoption of the National Housing Act on June 27, 1934. The primary objective of the legislation was to stimulate private enterprise and reduce unemployment in the construction industry. It was the task of the FHA to exert a stabilizing influence to the mortgage market, and to encourage the establishment and regulation of housing standards (both to improve livability and to decrease cost). Housing starts increased significantly in the late 1930s mainly because an FHA-secured loan was able to reduce the amount a prospective buyer needed for a down payment from 30% of the home's value to less than 10%. The minimum standards for home construction established by the FHA became, for nearly all intents and purposes, the standards of the industry.

In 1936, the FHA published a series of technical bulletins aimed at subdivision developers and building contractors that codified the agency's philosophies on neighborhood and small house designs.¹⁶ The architectural profession and periodicals such as *Ladies Home Journal* and *American Home* also contributed house plans aimed at the middle-class homebuyer. A pleasing street layout, uniform setbacks, homogeneous styles, and materials, and in many cases restrictive covenants and deeds were designed to not only make new

¹³Ibid, 145.

¹⁴Jackson, 192.

¹⁵Ibid, 196.

¹⁶Federal Housing Administration. *Principles of Planning Small Houses*, Technical Bulletin No. 4, Washington D.C.: U.S. Government Printing Office, 1936. See also the FHA's Technical Bulletins No. 1-3, 5.6.

¹²Thomas Carter and Peter Goss, Utah's Historic Architecture, 1847-1940: A Guide, (Salt Lake City, Utah: University of Utah Press, 1988), 138.

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neighborhoods more desirable, but to protect the developer's (and ultimately home buyer's) investment. Stock lumber and millwork items, and pre-fabricated materials, such as plywood and wallboard, lowered construction costs; while standardized designs reduced breaks in perimeter lines, making a more rectangular footprint, and concentrated mechanical systems in one area to reduce pipelines and ductwork.

What became known as the FHA "minimum house" was a single-family detached house with a square or slightly rectangular footprint (figure 4). On the exterior, the house could be constructed of wood (studs and siding) or brick masonry. The basic model had a simple gable roof parallel to the street and was decorated with modest Colonial Revival details. On the interior, the house was less than 1,000 square feet and included a living room, kitchen, two or three bedrooms and a bath. Single-purpose rooms such as the entrance foyer and dining room were eliminated, though the hallway was retained as a buffer between public and private rooms.¹⁷ The FHA house plans did not gain immediate popularity. One government publication produced in 1946 which tracked changes in housing from the late 1930s through the end of World War II states that 68% of pre-war houses insured by the FHA were the medium class, between 900 and 1,600 feet, with 80% of these having a separate dining room.¹⁸ However, in 1941 with the United States confronted by war, the FHA drafted the small-class "minimum house" to help solve the national defense-housing crisis.

Even before Pearl Harbor, defense housing had been on the minds of government leaders. On June 22, 1940, Congress passed the National Defense Bill that authorized the War and Navy departments and the United States Housing Authority (the entity supervising the nation's low-rent slum-clearance program) to cooperate to provide housing for defense workers. A Defense Housing Coordinator was appointed to oversee the distribution of additional funds provided by the Lanham Act, which passed in October of 1941.¹⁹

Eleven days after the attack on Pearl Harbor, Senate hearings were being held to amend the Lanham Act to expedite the provision of housing in connection with national defense, and to specifically provide housing for workers engaged or to be engaged in industries connected with and essential to the national defense.²⁰ That year, the whole structure of the U.S. government changed. The War Production Board (WPB) was given full control over all materials that were to be used for war, including materials previously used to construct private houses. In February 1942, President Roosevelt established the National Housing Agency (NHA) to oversee the functions of sixteen government-housing agencies, including the FHA.²¹

The nation's housing shortage was most acute in 1942. An unprecedented amount of in-migration occurred as workers flocked to cities where defense industries were located only to find there was no housing to keep them

¹⁹National Housing Agency, *War Housing in the United States*, (Prepared for the use at the Conference of United Nations, San Francisco, California, April 1945, Washington D.C.: U.S. Government Printing Office, 1945).

²⁰Defense Housing and Community Facilities: Hearings Before a Subcommittee of the Committee on Education and Labor, United State Senate, Seventy-seventh Congress, First Session on H.R. 6128, (Washington D.C.: U.S. Government Printing Office, 1941), 9.

²¹War Housing in the United States, 10.

¹⁷FHA Technical Bulletin, no. 4, 23-25.

¹⁸National Housing Agency, *Housing Practices – War and Prewar: Review of Design and Construction*, (National Housing Bulletin 5, Washington D.C.: U.S. Government Printing Office, May 1946), 31-32.

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there. In some neighborhoods near large military centers, the families of servicemen absorbed excess housing that otherwise would have been available for defense workers. The NHA began asking Americans to help by making available all vacant rooms, houses and apartments to war workers.²² The Federal Public Housing Authority (FPHA) was given the task of building publicly financed war housing. To the FHA fell the responsibility of stimulating and regulating private enterprise in the construction of housing for defense industry workers. During the war years, the FHA provided a total of \$1,800,000,000 in mortgage insurance. The agency also prioritized and processed all applications for privately financed war housing.²³

There was a general consensus that workers in defense industries were not soldiers. They had families and needed homes, not barracks.²⁴ The NHA discouraged hastily built temporary dormitories and shanties which would likely end up as ghost towns after the war.²⁵ The goal of the FHA was to guide private investors in producing livable communities that would serve the general public long after the war had ended. Americans were reminded of the housing shortage that occurred after World War I, and officials were asking themselves "Will history repeat itself?"²⁶ The FHA used its previously published bulletins to guide developers in producing pleasant neighborhoods with high-quality permanent small homes.

The job wasn't easy. The FHA had to convince the War Production Board (WPB) to direct scarce building materials and supplies to private developers-contractors. The FHA reasoned that private builders could utilize a few lots here and a favorably located site there [close to existing amenities], wholly unsuitable for large-scale Government projects.²⁷ The WPB and FHA reached a compromise and the private building program went forward under tight controls. The minimum house became even smaller: a one-story two-bedroom was limited to a maximum of 800 square feet. Statute required that the cost per permanent family dwelling shall not exceed an average of \$3,750.²⁸ Use of critical metals in permanent housing was reduced by 60% from peacetime, and framing lumber was reduced by 50% per dwelling. The WPB even specified how many brass keys could be produced for each lock.²⁹ Despite the restrictions, the FHA s program for private development paid off. A report published in April 1945 announced that the 800,000 family dwellings provided by private

²²National Housing Agency, Housing is Drafted for War, Here is Information for the Person Who Asks: Why Can't I Build a House? And for the Person Who Says: No Houses Ought to be Built When Materials are So Scarce! (Washington D.C.: U.S. Government Printing Office, February, 1943), 7.

²³War Housing, 10-11.

²⁴Federal Works Agency, *Defense Housing, 1941*, (Washington D.C.: U.S. Government Printing Office, 1941), 6.

²⁵Ibid, 8.

²⁶National Housing Agency, *Housing After World War I: Will History Repeat Itself*? National Housing Bulletin 4, (Washington D.C.: U.S. Government Printing Office, December 1945), 2.

²⁷War Housing, 12.

²⁸War Public Works: A Compilation of Statues, Executive Orders, Regulations, and Other Documents Relating to the Construction, Financing, Operation, and Maintenance of Community Facilities Under the Lanham Act, as Amended, August 24, 1934, (Washington D.C.: U.S. Government Printing Office, 1943), 3. Originally \$3,000 in 1940, the maximum cost was raised to \$3,500 in 1941 and to \$3,750 in 1942.

²⁹War Production Board, Division of Industry Operations, *Builder's Hardware Manual*, dated July 15, 1942, revised November 1, 1942, ([Washington D.C.: U.S. Government Printing Office, 1942]), 18-19.

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finance were developed generally in harmony with the future trend of growth in war industry communities and are a part of the Nation's permanent housing supply.³⁰

Private developers in many Utah County communities were able to get approval of the FHA and WPB to build subdivisions. Approximately 2,500 privately financed permanent dwellings were needed to house Geneva Steel's defense workers and their families: 1,200 units were approved by 1943.³¹ Over one-third of those dwellings were built in Orem. Christeele Acres and Geneva Heights were the first two subdivisions platted in Orem. Carter, Mountain View, Beverly Place, Drage, and Better Homes soon followed.³² The concept of the subdivision was new to Orem. Prior to the World War II, the bungalows and period cottages built in Orem were scattered among the farmhouses, fields and orchards. Most of the war-era subdivisions were built on the west side of Orem on a ridge overlooking the lake and close to the new defense highway leading to Geneva Steel.³³ Only Mountain View and Christeele Acres were built east of State Street. Christeele Acres subdivision was the vision of an Orem couple, J. Erval and Christa Christeensen.

The Christensen Family

Jesse Erval Christensen was born on February 28, 1898, in Pleasant Grove, Utah. His parents were John Edward Christensen, a Danish immigrant, and Caroline (Carrie) Marie Fugal, a native of Pleasant Grove. Christa Mix Christensen was born on November 10, 1903 in Ely, Nevada to Newman Henry and Betsy Chipman Mix. Erval and Christa met at a dance in 1921, and were married on June 13, 1923, in Salt Lake City. The couple had three children: Shirlee (born 1926), Marilyn (1928), and Steve (1931).

Erval Christensen attended the Utah State Agricultural College and Brigham Young University, graduating in agriculture and education. He always had at least two sources of income. He worked on his father's farm in Orem until John Christensen's death in 1937. Erval Christensen also taught business, typing and shorthand at Lincoln High School in Orem for forty years. Christa Christensen was a homemaker, and later worked for many years with First Security Bank. The Christensens were very community minded. Erval Christensen served on the board of several organizations including the Utah Berry Growers' Association, Timpanogos Marketing Association, Utah Education Association, and SCERA. Christa Christensen was an active member of the Church of Jesus Christ of Latter-day Saints (LDS or Mormon church) in Orem, serving as a ward Relief Society president, stake primary president, and as a teacher in many auxiliaries. She also served as president of the Utah Federation of Women's Clubs and presented a weekly book review for the KOVO radio station.

³³*History of Geneva Steel*, 43.

³⁰War Housing, 35.

³¹Pioneer's Dream," 6. See also Federal Regional Advisory Council for Defense, Health and Welfare Services, Federal-State Survey, Utah War Area – Provo Section, April 1943.

³²Nearly complete or complet portions of these subdivisions still remain, most with a fair degree of integrity. The majority of houses are of brick construction, similar to Christeele Acres, although two subdivisions, Geneva Heights and Drage, implemented wood-frame construction. Most of the buildings in Geneva Heights have received siding and retain little integrity. Because most of these subdivisions were developed slightly later than Christeele Acres, the architecture is somewhat different in style.

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During World War II, Christa was a Red Cross Organizer and nurse's aide in an amputee ward. Erval was a civil defense warden. Their children rolled bandages and collected scrap metal.

In the early 1940s, Erval Christensen would later reflect, "I got an urge to build a subdivision in Orem."³⁴ There were three factors that probably influenced this decision. First, as the son of a relatively prosperous Orem farmer, Erval Christensen had access to financial resources and business connections not available to most Orem citizens in the 1930s or '40s. Second, Erval and Christa built their own home on Snow Street (400 South) in 1926, which gave them experience in the construction industry. Third and probably foremost, in the summers of 1937 through 1939, the Christensens moved their young family to Santa Monica, California, where Erval attended summer school at the University of Southern California. While traveling in California, the Christensens observed many new subdivisions. Their daughter Shirlee recalls her parents frequently commenting on the efficient, affordable and convenient neighborhoods, saying "What a great idea!"³⁵

For the entire decade of the 1940s, Erval and Christa Christensen were heavily involved in every aspect of the Christeele Acres subdivision. They even built a service station (now demolished) on State Street just west of the subdivision. Eventually they sold their farm and house, and moved into one of the Christeele Acres duplexes in 1951. The couple divorced in 1954. Both later remarried. Erval Christensen and his new wife moved to Las Vegas in 1963. He died there on November 13, 1980. Christa Christensen continued to live in Christeele Acres for the rest of her life. She married Thomas Jones in 1959. He died in 1984. Many current residents of Christeele Acres remember Christa fondly. Christa Mix Christensen Jones died on May 17, 1985. Christeele Acres was the first and only subdivision the Christensen family developed.

History of the Christeele Acres Subdivision

Erval and Christa Christensen purchased the property for the Christeele Acres Subdivision on May 8, 1942, from Katie Steele. The site was known as the Brig Steele farm. Brigham Bailey Steele (1867-1939) and Catherine "Katie" Laird Steele (1875-1965) had been farming the land since the 1910s. Shirlee Christensen recalls "My first view of the Steele property and the folks' description of their plans for it were not terribly impressive. The ground was very rocky and most of it was a peach orchard with lots of dead branches, probably because irrigation had been stopped."³⁶ Christa Christensen coined the name "Christeele Acres," a fusion of the Christensen and Steele family names, with a possible secondary allusion to herself and the Geneva Steel Plant. Lincoln Avenue (now 450 East) and Scera Avenue (now 400 East), two names of significance to Orem and the Christensen family, were chosen for the two long streets. On September 30, 1942, the Orem Planning and Zoning Commission approved the first plat of the Christeele Acres. However, the federal government determined that the lots (and the houses planned for them) were too large! A new plat map was drawn with one lot added on each side of 400 East and 450 South. The Utah County Planning Commission approved this map on March 5, 1943 (figure 3).³⁷

³⁶Ibid, 27.

³⁷Christeele Acres was most likely the first subdivision plated in Orem. Because of delays in amending the plat map, it was probably not the first to be completed and inhabited. Geneva Heights, plated in November 1942, may have been the first completed project.

³⁴"History of J. Erval Christensen, Written by himself – in Las Vegas, 1970," TMs 1970, available in the Christensen Family Collection.

³⁵Shirlee Christensen, "Christeele Acres: The Christensen Years," (TMs, May 1999), copy in possession of author, 14.

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The Christensens financed the subdivision through the Farmers and Merchants Bank, in Provo. According to the title abstracts, most of the lots were sold during the summer of 1943, before construction was completed. All of mortgages were held by the Farmers and Merchants Bank, with the Christensen's having high-financial stakes in the subdivision until the 1950s. (The family held on to Christa's duplex until 1999). A restrictive deed agreement for Christeele Acres was filed in May of 1942. Restrictions were placed on setbacks (25 feet), materials (conforming to existing structures), stories (one), outbuildings (none, including trailers) and garages (one or two-cars 60 feet from the front of the property). No dwellings could be erected which cost less than \$3,500 with a ground floor of not less than 720 square feet. The inhabitants were also prohibited from carrying out a "noxious or offensive trade," or from being a nuisance to their neighbors.³⁸

The Christeele Acres deed agreement included the common practice of excluding individuals of any race other than the white race from owning, using, or occupying any building. Domestic servants of a different race were the exceptions. The idea of considering ethnicity and race in real-estate appraisals is an old one, but unfortunately government entities such as the HOLC and FHA did nothing to prevent the practice, and in some cases, such as the infamous "red-lining" of neighborhoods, endorsed policies that encouraged segregation and discrimination.³⁹ Christeele Acres was one of several Utah County defense-housing subdivisions with racial restrictions, but it appears the practice was optional and not mandated by the federal government. The Mountain View subdivision in Orem, platted on February 26, 1943, had deed restrictions similar to Christeele Acres, but without any reference to racial exclusiveness.⁴⁰

Groneman and Company Contractors was chosen to build both the infrastructure and the homes in Christeele Acres. Based in Provo, the Groneman Company was founded by Peter Groneman (1867-1949), a native of Provo around the turn of the century. Two of Peter's sons, Lyndon Le Roy (1902-1980) and La Var P. (1897-1969), joined as partners in the 1920s. Peter's grandson, Jack L. Groneman, who worked on the Christeele Acres subdivision as a young man, described the company as a "commercial-industrial" general contracting firm. He did remember the firm doing a second subdivision (near 300 West and 400 North in Orem) after Christeele Acres. Jack Groneman did not remember having any problems finding laborers to work on the project, but does recall that there were some delays due to supply problems. Mr. Groneman retired in 1982 and the firm was dissolved.⁴¹ Of the six new subdivisions in Orem, Christeele Acres, perhaps, had the best location. Spencer School and the Lincoln Junior-Senior High, the SCERA recreational complex, and the 800

⁴¹Apparently some contractors did have trouble finding skilled labor. Alan Brockbank, the developer of the Richland Park subdivision in American Fork (1943), recruited Japanese workers from the Topaz Internment Camp at Delta, Utah. He employed 30 men as carpenters and trained "40 young Japanese women to hang and finish sheetrock." Two ironies are apparent in the situation: 1) Richland Park had racial restrictions so the Japanese-Americans who worked on the houses were not allowed to live there; 2) Brockbank had to hide his Topaz workers from representatives of the Utah County Central Labor Union. Elizabeth McCune, *Richland Park*, (TMs, 1994), photocopy in possession of author.

³⁸"Agreement," dated March 8, 1943. Available at the Utah County Recorder's Office.

³⁹For a full discussion of this subject see Jackson's Crabgrass Frontier, chapter 11.

⁴⁰Ironically, there was a special regulation prohibiting discrimination based on race for the employment of workers building defense housing and other public works; but unfortunately, no regulation existed to insure that non-whites would be able to rent or own the homes that were built. Shirlee Christensen stated she never thought of her parents as bigoted. She was frankly shocked to discover that Christeele Acres had racial restrictions. Of course, in the 1940s the minority population of Utah was so low, it is likely the issue never came up. During the 1950s, the FHA stopped the practice. Today there are a few minority families living in Christeele Acres.

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South Stop on the interurban railroad (the "Orem line") were all within walking distance. The Geneva Steel Plant was a ten-minute drive away. Rowena Nielson, a long-time resident of the subdivision, has stated her favorite part of the neighborhood is the view of Mount Timpanogos from her bedroom window every morning.⁴² Christeele Acres apparently needed little advertising. The only mention of the subdivision in local newspapers was an advertisement placed by the Utah County Central Labor Union that listed several housing projects. Marilyn Christensen Clark remembers a large sign on the site near the duplexes, but with the construction going on so close to State Street, Marilyn is convinced everyone in town knew about the development from the very beginning.⁴³

Erval and Christa Christensen spent many months pouring over floor plans and material samples. Christa picked out the bricks, exterior and interior paint colors, and commented on design. Erval had many long meetings with housing officials and William Byrd, the president of the Farmers and Merchants Bank. According to Bernice Cox, an original resident and chronicler of Christeele Acres, the two-bedroom homes sold for \$4,950. The three-bedroom homes, reserved for Geneva Steel management-level employees, were priced at \$6,000. Interest rates were between 4.5 and 5 percent.⁴⁴ Other sources reported slightly lower prices of \$3,500 to \$4,500. The price of a home in Christeele Acres was higher than the \$3,750 maximum set by the federal government.⁴⁵ However, the developers must have had some latitude, because the price of defense houses throughout Utah County was similar.

Ironically, wartime restrictions may have been partially responsible for the high-quality and durable appearance of the Christeele Acres houses. Because softwood lumber was in demand for such war items as battleship decking, brick masonry was encouraged for defense houses. Brick was already popular and readily available in Utah. In contrast, while most early twentieth Utah houses had fir floors, conservation programs recommended the use of oak flooring.⁴⁶ The use of wallboard, preferably nonwood pulp boards, was also encouraged. The Christeele Acres houses feature interior walls of what Jack Groneman calls "rock lathe," a type of sheetrock with holes and covered with plaster.⁴⁷ The roofs were sheathed with asphalt shingles.

Construction on the homes in Christeele Acres began in the middle of 1943 and lasting to the beginning of 1944. Marilyn Christensen remembers her parents worrying that some of the cement work might freeze. The subdivision was both suburban and rural. The neighborhood had sidewalks, gutter, and driveway, but the

⁴⁵Defense Public Works.

⁴⁶War Production Board, Housing Branch Construction Bureau, War Housing Manual including War Housing Critical List and Procedures for Processing Applications, effective December 12, 1942, ([Washington D.C.: GPO, 1942]), 6-7. War Housing, 12.

⁴⁷Groneman interview.

⁴²Garth and Rowena Nielson, interview conducted by Marilyn Christensen Clark, May 1999, Orem, Utah, cassette tape.

⁴³Marilyn Christensen Clark, telephone interviews conducted by author, February-June 1999, notes.

⁴⁴Bernice, Cox, "Christeele Acres," in *History of Timpanogos, Orem Eleventh, Hillcrest Fourth Ward: A Century and Beyond, 1885-1998*, (Orem, Utah: Published by the Hillcrest Fourth Ward, Orem Utah Hillcrest Stake, 1998), 124-125. Full-time employees of Geneva Steel occupied the threebedroom homes, though a crane operator and a draftsman as well as managers were living in them. The restriction on three-bedroom homes lasted after the war. Non-Geneva employees could not purchase them until the 1950s.

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roads weren't paved until a few years later. In the front, the houses had small tidy lawns and flowerbeds; in the back was room for a large "victory" garden and several fruit trees. The irrigation ditch at the rear of the property could flood the entire lot with just about nine minutes worth of water. Septic tanks were provided for the homes until the Orem City Sewer System was established in 1945. Mail was originally delivered to rural route boxes located on State Street; however within a few years, the subdivision had city addresses and regular mail service.

Of course, electricity was available to every home, but the water had to be heated on a small stove according to Ava Stewart.⁴⁸ Defense housing occupants were among the lucky few individuals who got a new electric stove and refrigerator. A coal furnace in the basement heated the houses with a coal chute near the basement steps. Because the average square footage of the homes was around 720 square feet, "space-hogging" stairs were moved to the exterior of the house. This proved to be an inconvenience to the residents who had to exit the house in winter in order to stoke the furnace. The majority of homeowners remedied this situation by building a lean-to or addition over the basement stair, or by adding a second stair inside the house. When natural gas lines reached the subdivision in the 1950s, many property owners took advantage of the technology to update their heaters and stoves, and to install more efficient water-heaters.

Christeele Acres could be classified among the early automobile suburbs. Even though gas was rationed and American citizens were discouraged from using their automobiles during the war years, more than one-half of early residents had automobiles. According to one source, although buses were available to Geneva Steel workers and the "Orem line" was nearby, 63% of employees used private automobiles, 29.7% walked or used more than one method of transportation.⁴⁹ Garages were optional for home buyers and an estimated 40% of property owners had garages built by the Gronemans soon after the completion of the subdivision.

By the beginning of 1944, Christeele Acres was a neighborhood brimming with families. If, as the early twentieth-century real estate industry believed, a homogenous group of people make a good neighborhood, than Christeele Acres was a phenomenal success. The families who moved into the subdivision had much in common. They were mostly young couples with children. Though defense housing was designed to accommodate interstate-migration, the majority of Christeele Acres appear to have come from Orem and many rural communities within Utah. As a result, the families were predominantly members of the LDS Church. Though they had similar backgrounds, their occupations varied. The 1944 Polk directory for the city of Orem lists the occupations of many Christeele Acres residents. Twenty-five percent of heads of household were specifically listed as working at Geneva Steel, with another six percent employed by Columbia Steel. Eight percent had occupations probably associated with the steel plant or the railroad (e.g. managers, engineers, etc.). There were five men in the armed forces, including one resident's son. The remaining 18% had occupations not apparently associated with a defense industry: four salesmen, four teachers (including two who taught at Lincoln High with Erval Christensen), a plumber, a druggist, a printer, the owner of a produce company, and the supervisor of the city road department. The directory also listed three employed wives: a teacher, a stenographer, and a clerk. Unknown occupations and non-listed residents account for 37%.

⁴⁸Ava Stewart, interview conducted by Marilyn Christensen Clark, May 1999, Orem, Utah, cassette tape. Ava Stewart refers to the stove as a "monkey" stove.

⁴⁹ Federal State Survey figures quoted in Carla Black's Menlove Subdivision, TMs 1992, 2-3.

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On the surface it appears, contrary to federal mandate, that the homes were not all occupied by defense workers. There was a provision which required that the homes must be reserved for war workers for 60 days [and] could not be turned over to anyone else unless the war workers failed to appear.⁵⁰ However the war-time employment situation in Utah County was complex. Many of the residents of Orem worked at the steel plant part-time during the war, in addition to their regular jobs and farm chores. During both the construction and the wartime operation of the steel plant there was plenty of work for teachers during the summer and farmers during the winter. Afternoon and night shifts at the plant gave ample opportunity for any able-bodied man or woman to contribute to the war effort.

The Geneva Steel Plant had been in operation for a little over a year when production was shut-down in the summer of 1945. With the end of the war in sight, Geneva Steel and the city of Orem faced an uncertain future. Many workers left the area during several months of bidding by seven steel companies vying to purchase the steel plant and convert it to peacetime use. The United States Steel Corporation bid was finally accepted on May 23, 1946, and the plant was back in production by the end of 1946.⁵¹ In the two years after the war, 38% of homes in Christeele Acres changed ownership. Between 1946 and 1950, 37% changed ownership again or for the first time. These changes were a source of concern for the Christensen family. According government regulations, only half of privately financed defense housing could be sold outright. The other half had to be rented or sold under lease-option agreements.⁵² This was apparently the case with Christeele Acres. Erval and Christa Christensen held many of the mortgages (on agreement) at Farmers and Merchants Bank until the 1950s. After the war, the occupancy restrictions on privately financed war housing were lifted and sellers were asked to give preference to veterans.⁵³ Fortunately for the Christensens, the veterans came home to find jobs, raise families, and with the G.I. Bill and Veterans Administration (VA) home loans available, the houses in Christeele Acres did not remain vacant for long.

Orem and Christeele Acres in the Post-War Years

The families who moved into Christeele Acres after the war were similar to those who had been there during the war, with one difference: a large portion remained for the rest of their lives. The families continued to be predominantly raised in Utah, Caucasian, middle-class, and members of the LDS Church. Many, like Garth Nielson, continued to give a lifetime of employment to Geneva Steel. Some worked at Geneva part-time. One example was Ray Stewart, who moved in after the war, worked on a ski patrol, ran a ski resort, and worked at the plant at night. Approximately 25% of Christeele Acres residents worked at Geneva in the 1950s. The other 75%, like the teachers at Lincoln High School, continued working in their community as they had before. Many of these 1950s families and their descendants still live in Christeele Acres. There was a strong sense of community in the neighborhood. Their children played in the streets together. Ava Stewart remembers the

⁵⁰War Housing, 12.

⁵¹History of Geneva Steel, 223-224. Clyde E. Weeks Jr., Sagebrush to Steel: An Orem Centennial History, 1861-1961 (Orem, Utah: Orem City, 1961), 52.

⁵²War Housing, 12.

⁵³National Housing Agency, The Facts About Homes for Veterans: The Housing Shortage, Housing Available for Veterans, and Home Loans Under the G.I. Bill of Rights, (Washington D.C.: U.S. Government Printing Office, September, 1945), 3.

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Christeele Acres Historic District, Orem, Utah County, UT

3:00 a.m. cake and pie get-togethers after all the neighbors got up to take their turn with the irrigation water. These families, many with five, six or even seven, children, finished the basements and built additions to fit them in. Even the Squire family, who could afford to have a bigger house built in the mid-1950s, moved only a half a block to the adjoining subdivision to the east.⁵⁴

Within a few years, Christeele Acres became nearly indistinguishable from the plethora of post-war houses in post-war subdivisions. The "cape cod cottage" look, with its boxey shape, multi-pane windows, and muted Colonial Revival details, was copied by thousands of post-war developers, the most famous of which was New York's Leavittown begun in 1947. The FHA's principles of small houses eventually evolved into the ubiquitous picture window ranch houses that now surround Christeele Acres on three sides. Orem has continued to grow. By the time Geneva Steel fell on hard times in the 1980s, Orem was thriving as a commercial center. Recently Utah County has experienced a second population spurt fueled by the growth of computer-related industries in the area. Today, though Christeele Acres is just one of many Orem subdivisions, and despite a 21% rental and a 4% vacancy rate, the neighborhood still has a strong sense of community.⁵⁵

Conclusion

The Christeele Acres Historic District is historically significant both for its direct connection to the United States' involvement in World War II, but also for its place in the history of domestic architecture and suburban development in the last half of the twentieth century. World War II-era defense housing was the prototype for decades of post-war subdivision development. Christeele Acres is also significant to the history of Orem. The 1943 subdivision was built at a turning point for the city as it made the transformation from agrarian village to industrial city. The subdivision revolution that began in Orem during the war years eventually transformed the city into the suburban residential and retail center of Utah County. The Christeele Acres subdivision retains a high degree of historic integrity and most adult members of the Orem community recognize its name. This makes the subdivision a good candidate to be the first Orem defense-housing neighborhood to be designated as a National Register of Historic Places District.

⁵⁴Squire interview.

 55 Every present and past resident interviewed for this nomination had a positive experience living in Christeele Acres. From the young families who stayed for only a couple of years while attending the university to the long-time senior-citizen residents — the "newly-wed and nearly-dead" as practically every interviewee phrased it — all the neighbors enjoy their home in Christeele Acres.

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Section No. PHOTOS Page 1

Christeele Acres Historic District, Orem, Utah County, UT

Common Label Information:

1. Christeele Acres Historic District

- 2. Orem, Utah County, Utah
- 3. Photographer: Korral Broschinsky
- 4. Date: 1999
- 5. Negative on file at Utah SHPO.

Photo No. 1:

6. Houses along 400 East. Camera facing southwest.

Photo No. 2:

6. Houses along 450 East. Camera facing northeast.

Photo No. 3:

6. Irrigation ditch at the rear of 1009 South 450 East. Camera facing northeast.

Photo No. 4:

6. Houses along 1010 South with landscaping variations. Camera facing southwest.

Photo No. 5:

6. Interior wall construction detail. Camera facing southwest.

Photo No. 6:

6. Duplex at 375 East 1010 South. Camera facing north.

Photo No. 7:

6. All three duplexes as seen from the west side of State Street. Camera facing northeast.

Photo No. 8:

6. Duplex at 365 East 1010 South. Camera facing southeast.

Photo No. 9:

6. Three-bedroom house at 1009 South 450 East. Camera facing northeast.

Photo No. 10:

6. Two bedroom house at 963 South 450 East. Camera facing east.

Photo No. 11:

6. Two non-contributing houses on 900 South. Camera facing southeast. Left: 426 East 900 South with a piggyback second story. Right: 416 East 900 South with a large side addition.

Section No. PHOTOS Page 2

Christeele Acres Historic District, Orem, Utah County, UT

Photo No. 12 6. 396 East 1010 South. Camera facing south.

Photo No. 13: 6. 979 South 450 East. Camera facing southeast.

Photo No. 14:6. Front door detail of 1009 South 450 East. Camera facing east.

Photo No. 15: 6. 384 East 1010 South. Camera facing south.

Photo No. 16: 6. 1000 South 400 East. Camera facing southwest.

Photo No. 17: 6. 962 South 400 East. Camera facing west.

Photo No. 18: 6. 426 East 1010 South. Camera facing south.

Photo No. 19: 6. 416 East 1010 South. Camera facing south.

Photo No. 20: 6. 934 South 450 East. Camera facing west.

Photo No. 21:6. 930 South 400 East. Camera facing southwest.

Photo No. 22:6. Contributing garages on 400 East. Camera facing west.





CHRISTEELE ACRES HISTORIC DISTRICT OREM, UTAH COUNTY, UTAH CONTRIBUTING & NON-CONTRIBUTING BUILDINGS, 1999



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This dwelling may be considered the minimum house for a family of three persons or a family with two small children. It conforms to, and to some extent exceeds, the minimum requirements of the Federal Housing Administration. All of the functional requirements of a house are included; privacy of the sleeping rooms is provided; the bathroom is located in reference to the other three rooms of the house, so that it may be entered from each without passing through another room.

The walls of the house may use standard 8-foot studs except on the gable sides. The framing is extremely simple, with one interior bearing partition permitting either one span of 24 feet, supported in the center, or two spans of 12-foot joists. The plumbing is united on one stack, permitting a minimum of piping. The living room is heated directly from the heating unit. The bedrooms are heated from a duct carried below the ceiling construction, the bathroom by the hot-water storage tank.

The accompanying drawings show two of the many possible variations of the basic design. Besides utilizing different materials, variety may be achieved through variation of the character of the roof, orientation of the house, and changing the location of openings. Where it may be afforded, a porch may be added, or a garage designed in connection with the house may increase the range of variation in appearance.

The exterior walls of the house may utilize any one or a combination of two of the materials commonly in use, such as wood siding, shingles, brick, concrete block, stucco, or stone. In approaching the lower limit of the price range, the most economical finishing material available in the locality is assumed to be used. The lower limit of the price range also assumes that the first-floor surface will be the finished foundation slab. This house should be pro-

duced, depending upon labor and conditions in the material markets in a given locality, at a cost ranging from \$1,200 to \$1,500.

The addition of a one-car garage would add to the total



FIDST FLOOD

cost approximately \$150 to \$200. The addition of a basement in a dwelling of this minimum type is not considered practicable. If, however, this house were built with continuous foundation walls instead of on a foundation slab it would probably cost about \$150 to \$200 more.

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THREE-BEDROOM HOUSE CHRISTEELE ACRES, OREM, UTAH 1009 S. 450 EAST, MAIN FLOOR PLAN

TWO-BEDROOM HOUSE CHRISTEELE ACRES, OREM, UTAH 963 S. 450 EAST, MAIN FLOOR PLAN

