

This program is dedicated to my mother and father, Caryl and Phil Jacques, for their never ending emotional and financial support, without which I would not have been able to come so far.

The Professional Project is the culmination of formal education, while it is also the starting point for a professional life-long career in the field of Architecture. Therefore, the reasons I used to select my Professional Project were based on what I felt I needed to improve myself and better prepare myself for professional practice. The criteria I used to select my project were:

The great interest I have always had with sports and sporting facilities led me in the general direction for something of great interest.

The racing facility is a very real project and is a topic of much discussion in Oklahoma at this time.

Selection of a project that would allow master planning on a large scale, while also allowing intense study and design of a few key areas.

Design of an actual project being proposed by the Town of Mannford on a real site with possible influence to the success of the actual project and the sport of horse racing.

With these criteria, I have selected to design a horse racing facility in Creek County Oklahoma, Cherokee Downs. (actually Cimmaron Park). I felt that since racing facilities are similar to a small city, scale wise, I would be able to accomodate master planning while doing further study on the Grandstand and other key areas. Some of the reasons for this program are:

Establish a basis for the project

Establish design objectives

Establish functional requirements

Establish limits for the project

Establish an image for horse racing in Oklahoma

Identify and understand the problem

This program represents a partial completion of the requirements for the degree of Masters of Architecture from Oklahoma State University.

# Acknowledgements

Many special thanks to the following people who were vital to the development of this program and will be instrumental in the design of the project in Spring 1984.

Demetre Dempolis Century A-E 1900 Yorktown, Suite 300 Houston, Texas 77056 (713) 622 - 2151 Designer of Louisiana Downs which was used as a base for Cherokee Downs.

Stan Gralla Gralla Associates Suite 201 6400 Classen Blvd. Oklahoma City, Oklahoma Assistance on the programing of the Backstretch facilities.

Aurthur Hershey Los Angeles Turf Club Santa Anita Park Arcadia, California 91006 (213) 574 - 7223 Director of Publicity at Santa Anita Park

Jim Knight Professor of Architecture Oklahoma State University Thesis Advisor

Autotote limited of Deleware

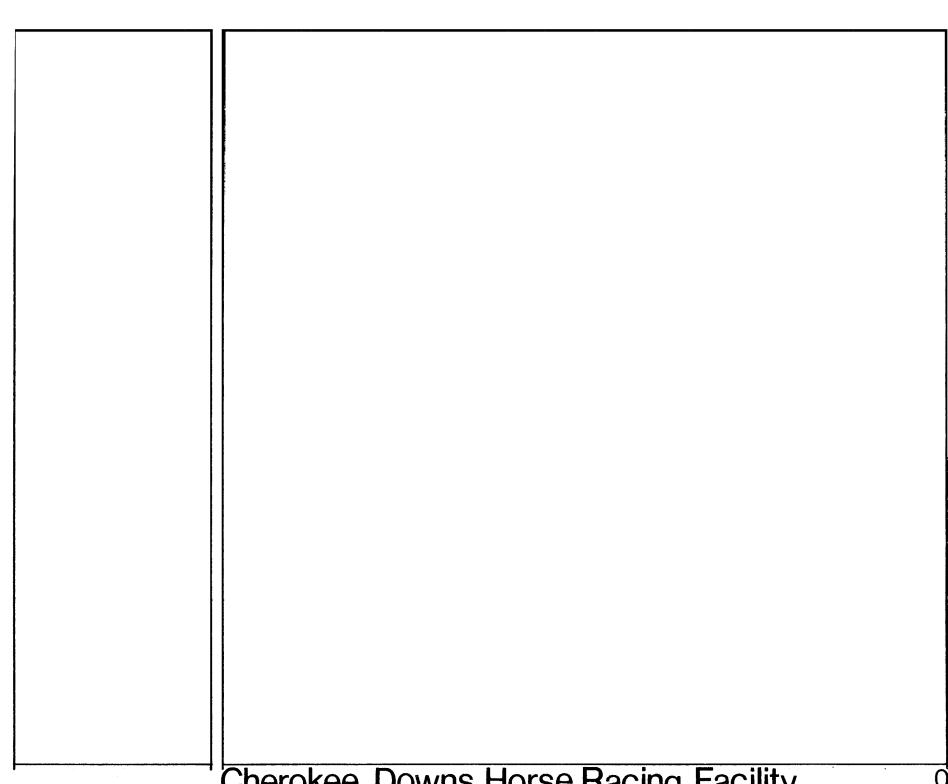
Kinko's Copies of Stillwater

Alan Brunken

Programing Advisor

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In describing a race meet, there are five major components associated with the race goer:

Gambling

Movement

Drinking

Eating

Spectating

The most important of these elements in the sport of horse racing is gambling. The excitment experienced at the track is a product of many people anticipating the outcome of the races and perdict the results. Some of the feelings experienced from this excitement are; joy, sadness, tension, looseness, anticipation, relief, and drama. As noted by Al Rusch of the University of Illinois, the "underlying concept of a race meeting would be to describe it as a gamblers garden party or fair.

The second component, which is also very important is the concept of movement. During the course of a race meet, crowd movement is abundant and large quantities of people are always moving about. The greatest single movement would be the movement from the Parade Ring viewing area, past the wagering windows, bars, and concessions to the track viewing area. Therefore, the bulk of the betting, bars, and concessions should be located on this path to ensure easy accessability and use. Another important type of movement is that of vertical circulation. It is very important to move large numbers of people from the Entrance Hall to the various areas within the Grandstand. This circulation should be by escalators and a grand staircase to allow the public to get a sense of movement. A secondary means of movement would be by elevators and enclosed stairs for fire exits. It will be very important to move people vertically while maintaining a sense of movement and orientation. Finally, but also very important is the movement of large crowds from the parking areas to the Grandstand. Areas should be provided in the form of greenbelts to allow the people to move freely from their automobiles to the Entry Plaza. This is a critical part in the entry sequence and must set the race goer in the proper frame of mind for a race meet.

As mentioned before, the bulk of the bars and concessions should be located in the area of greatest crowd movement and nearest the finish line where the bulk of the seating will be. Food concessions are very important at race meets due to the long periods of time inbetween the action. Eventhough food concessions are great, the single most important concession is the bar. The sale of mixed drinks, beer, and wine is crucial to the sucess of a race meet and also for public enjoyment. An exception to the concepts of movement and concessions are the Lounges, Table Seating, and Penthouse Suites where the spectator is waited on. Finally, the spectating component is very important, but is much different than other sporting events. Die to the 1 lap nature of the sport, the spectator cannot exerience the entire race from 1 point so the primary location is at the winning post. Some people actually never view a race.

#### **Function**

Since one of the primary public funtions of the facility is the viewing of race meets, the Grandstand should provide comfort and allow for the best views of the track.

Since a second of the primary functions of the facility is the placing of bets, the wagering areas should centrally located and easy to access.

Due to the large numbers of spectators viewing a race meet, the circulation halls should be large and easy to move through.

Due to the large sums of money wagered, and the value of the horses, security is a top priority in the design of the complex.

Since the care, training, and racing of the horses is just as important as the spectators, the physical layout should provide for ease of movement and the centralization of activities for the horses.

#### Form

Since the site is heavily wooded and surrounded by water on three sides, the Grandstand should act as a jewel on the knoll.

Since the Backstretch structures are of small scale and shade is desirable, the Backstretch should preserve the natural site and blend in with the natural vegitation.

### Economy

Since the nature of the project will not allow for phasing, with the exception of the Horse Hospital, the entire complex should be built as a whole.

Since money is such a major item in the horses and the wagering, the facility should portray an image of security, strength, growth, and wealth.

#### Time

Since major horse racing is new to the State of Oklahoma, certain facilities must be allowed to expand over time and the crowds grow.

Cherokee Downs will be the first major horse racing facility in Oklahoma and the nearest existing facility is Oak Lawn in Hot Springs, Arkansas. The facilities are to be located on a 480 acre plot on Keystone Resivoir near Mannford, Oklaoma and include the following:

Parking for 7030 automobiles and 50 buses

Seating facilities for approximately 12000 people, with a total capacity of near 30000 people.

Complete horse boarding and training facilites to be open year-round.

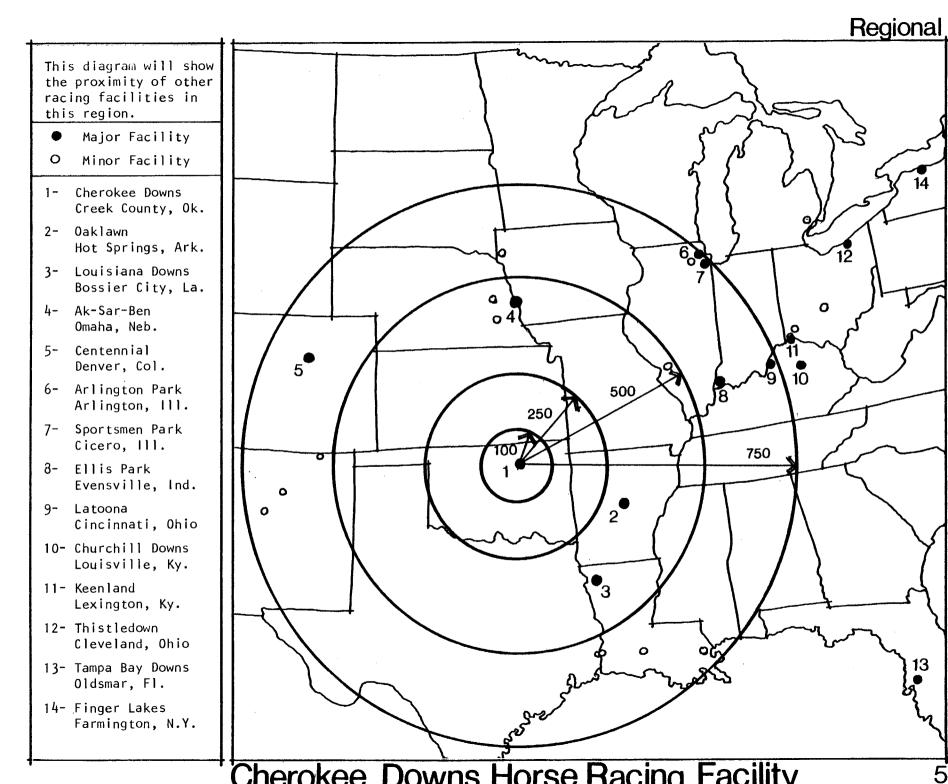
Complete Horse Hospital

Complete Paddock House and Parade Ring

Racing surfaces to accomadate all types of races ranging in length from 2 - 12 furlongs for all types of horses, including harness racing and steeplechase.

Master planning of a 150 room luxury resort hotel and support facilities.

Adjoing marina for use by the hotel, recreationalists, and race goers.



State

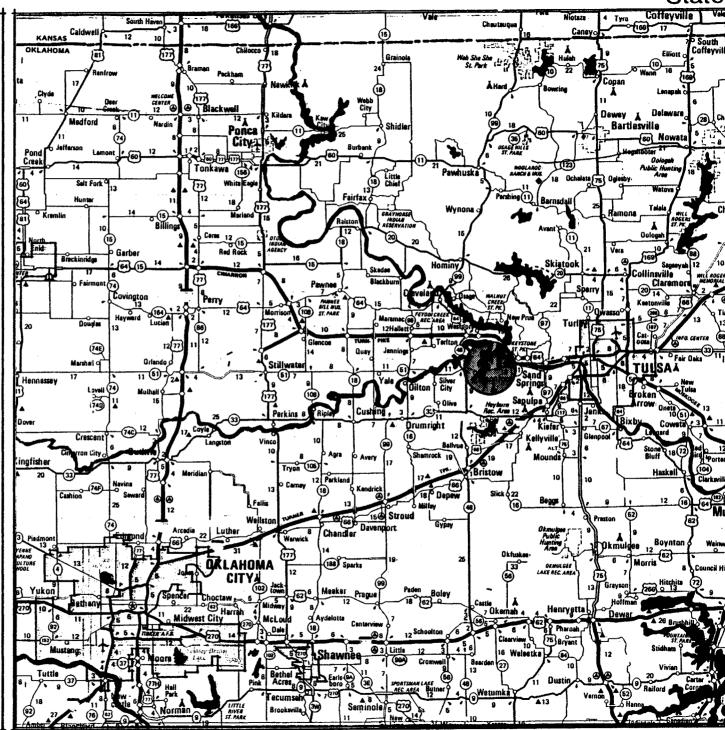
The site is located on Keystone Resivoir, aproximatley 20 miles West of Tulsa. Keystone Resivoir is manmade by Keystone Dam at the East end. The lake is fed from the North by the Arkansas River and from the West by the Cimmarron River.

Distances to other cities in miles.

Stillwater 45
Oklahoma City 80
Enid 90
Ponca City 90
Dallas 280
Kansas City 280
Little Rock 240

The site is accessed only from the East and the West by Highway 51.

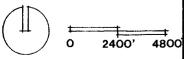
miles

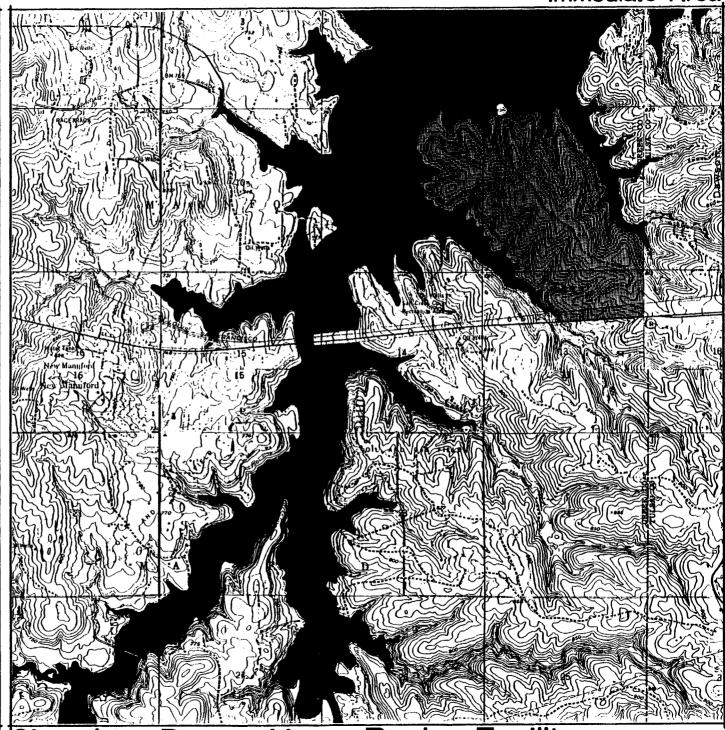


Immediate Area

The site is located 2.5 miles East of the city of Mannford in Creek County and with the proposal of the racing complex the site would be incorporated into the Mannford city limits. The site is located on a finger of land projecting into Keystone Resivoir and is approximately 480 acres. The site is bordered on three sides by water and the remaing boundry is made up of Highway 51 and the Creek County/Tulsa County line. Mannford is considered the Bass fishing capitol on Keystone Resivoir, therefore the lake is highly used for both fishing and recreation for a good percentage of the year. Boat access to the site is a definate possibility.

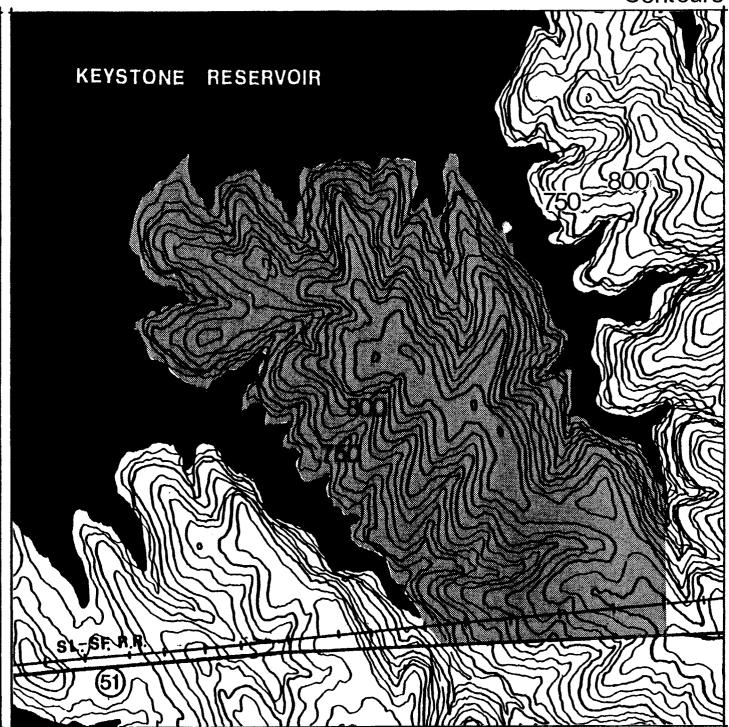
The black circles denote the existing public boat ramps in the area and Keystone State Park is located 1 mile East in the very upper left corner of the map.



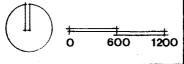


Contours

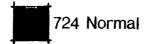
The site is located in an area of low rolling hills and is situated on a peninsula North of Highway 51. The site slopes very gradually at the shore line up to the flood level of 755. The slope becomes slightly steeper up to the ridge which becomes almost flat. There is only one gully of significance and it is located on the South part of the West end. The contour interval is 10 feet with the major contours at 50 feet intervals. The normal lake level is at 724 as shown on this map.

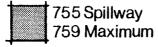


Downs Horse Racing Facility

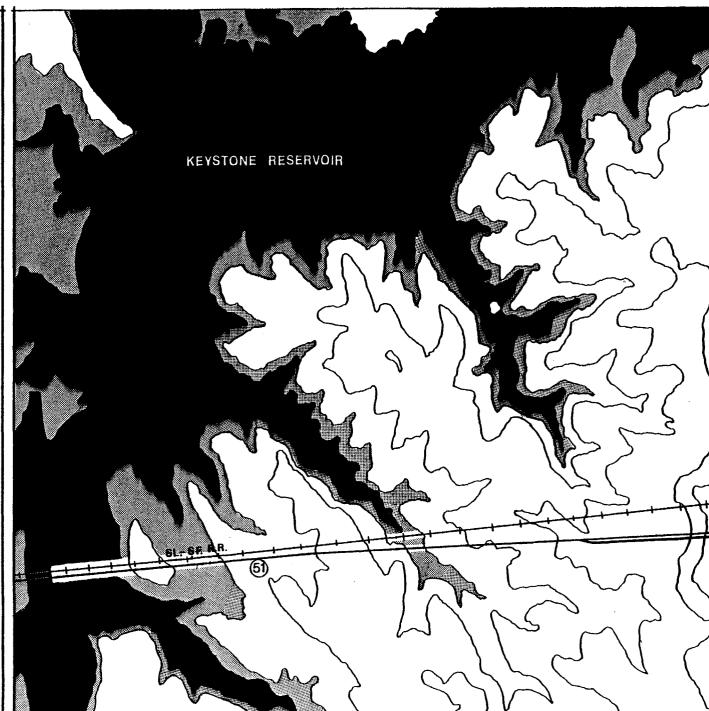


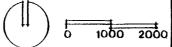
# Lake Level





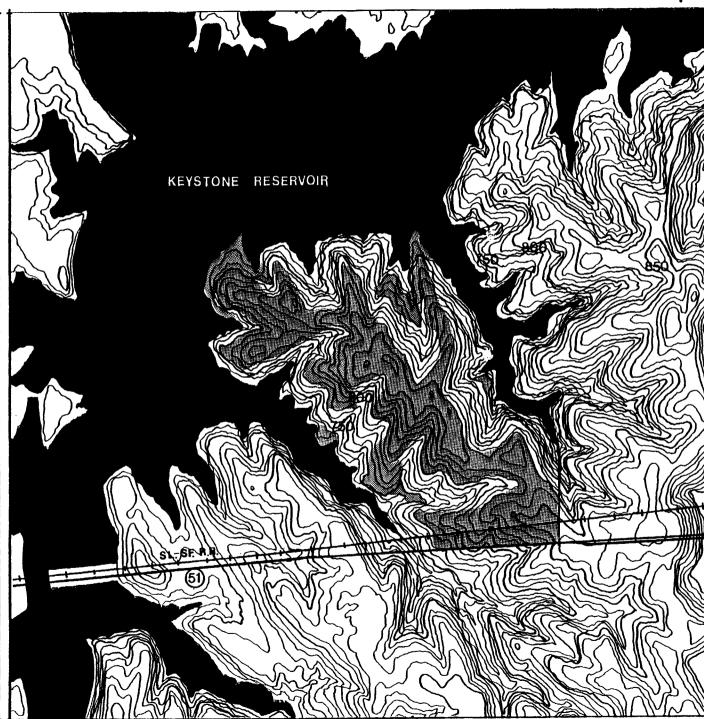
Normal lake level is usually near the 724 level. The Maximum flood level is at 759 with the spillway at 755. The highest recorded lake level is 749. Therefore, as a design criteria, all structures and site developement should be above the 760 lake level.

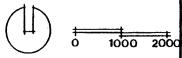




# Site Slope

As noted earlier, the site slopes very gentley and a good portion of the site would be suitable for parking as is. The shaded areas on this map denote the areas of slope which are 1:10 or less.





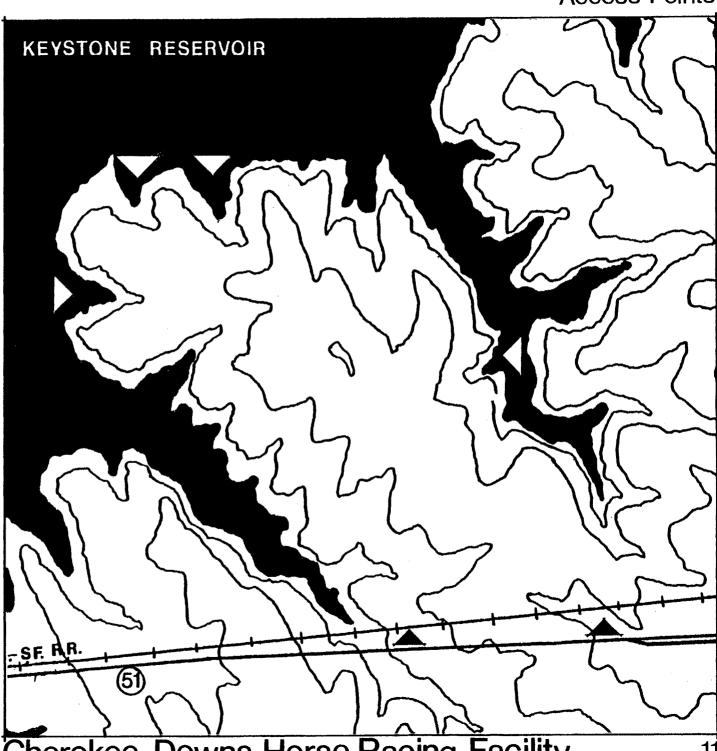


LAND ACCESS



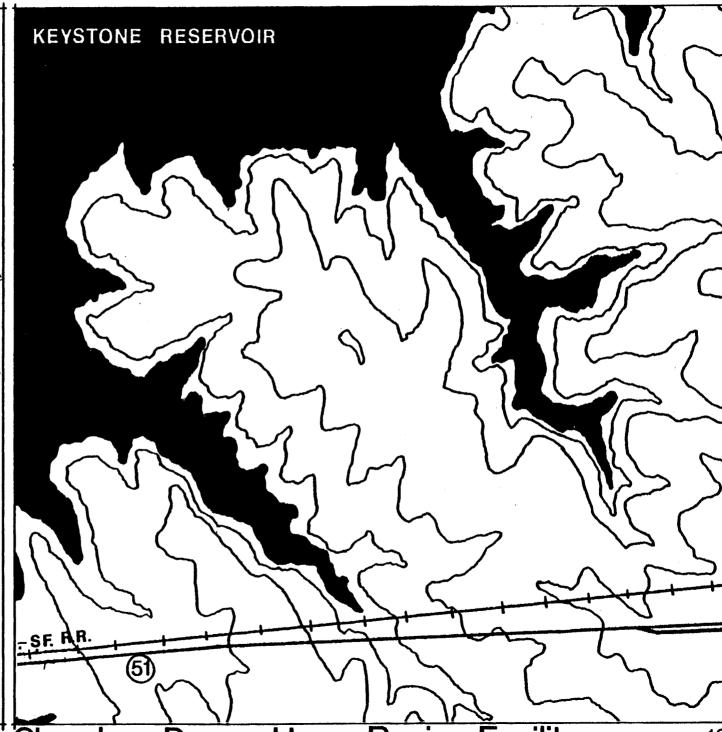
WATER ACCESS

The land access points are based on the current conditions and the location of the existing access points for the oil field. Other access foints could be established with major grading or by the construction of a bridge over the railroad tracks. The water access points are also based on existing conditions, where the site slope is easy enough for easy access without extra site work being needed. The development of a marina and docking facilities on the lakefront is a feasable possiblity. The racing facilty could become another recreational area on the lake.



Downs Horse Racing Cherokee

The typical trees located on the site are Pin Oak and Black Oaks ranging in size from 20' - 40'. There are also some Cyprus trees intermixed among the Oaks. The undergrowth consists of long meadow like grass and small scrub brush intensifing in the small gullys. The tree line begins above flood line and forms an almost continuous cover over the site with the exceptions of a few open areas near the crest. There are also no trees located in the area between the railroad tracks and Highway 51.



## Conditions

#### **Building Codes**

The building codes applicable to the town of Mannford are:

Southern Building Code Mannford Town Code

N.F.P.A. 150 (stables)

### Zoning

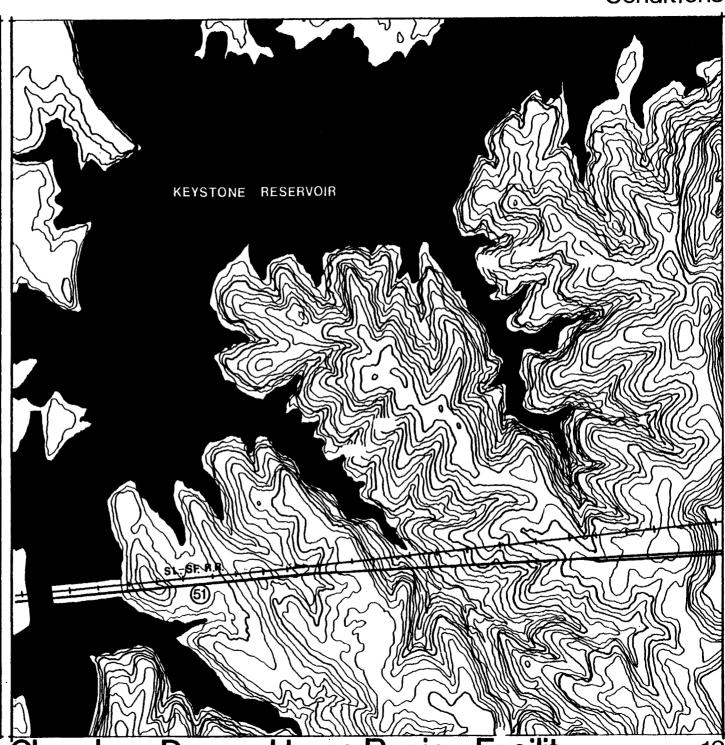
Currently the site is zoned agricultural, but with the development of Cherokee Downs, the zoning will be changed to a Planned Unit Development. Furthermore, with this development, the site would be incorporated into the city limits of Mannford.

#### Restrictions

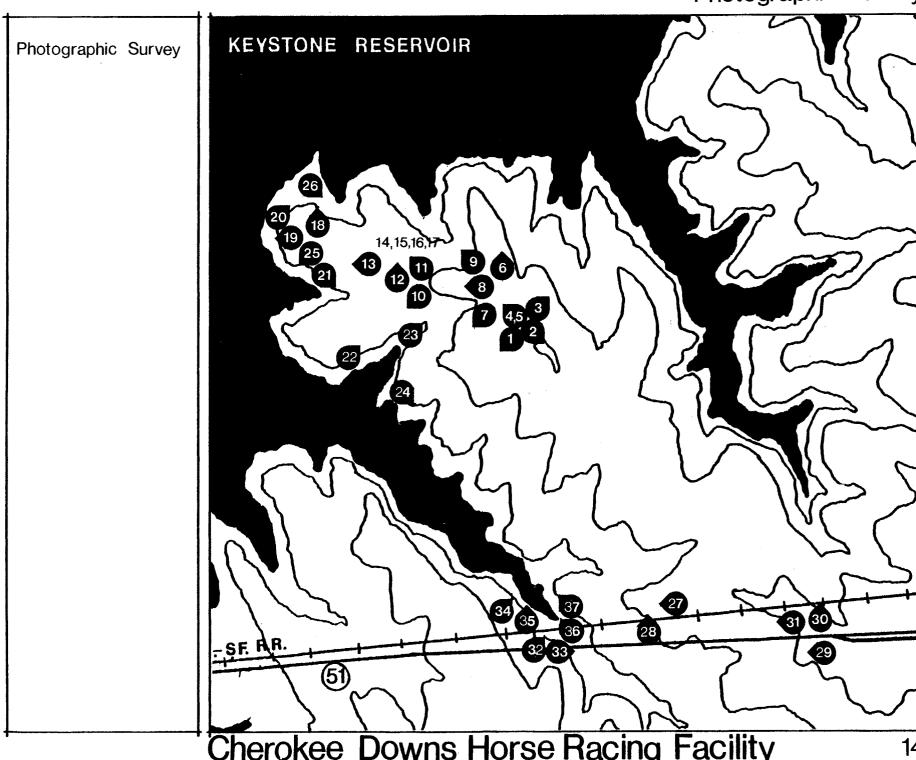
The only restrictions currently on the site are the flood level elevation and the rail-way right-away.0ther than these, the site is totally free from any building restrictions.

#### Utilities

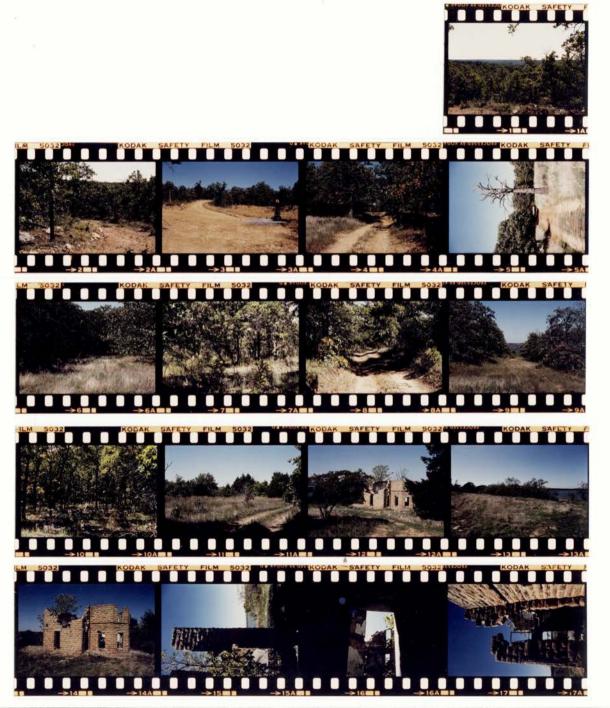
There are currently no utilities on, over, or under the site with the exception of an unused oil line and unused power lines along the railroad tracks. All



Photographic Survey



Facility



Cherokee Downs Horse Racing Facility

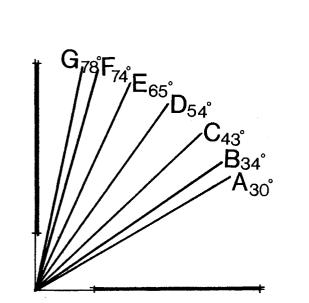


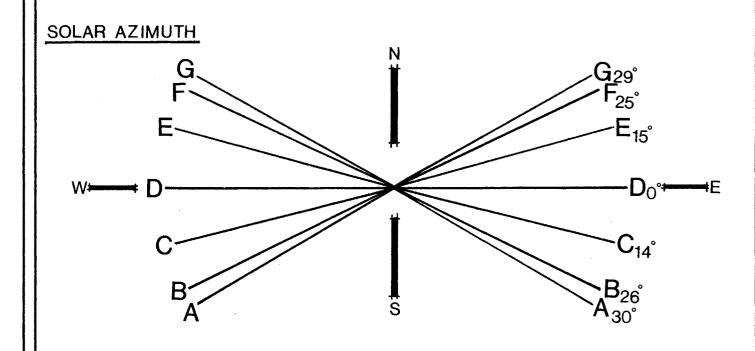
Cherokee Downs Horse Racing Facility

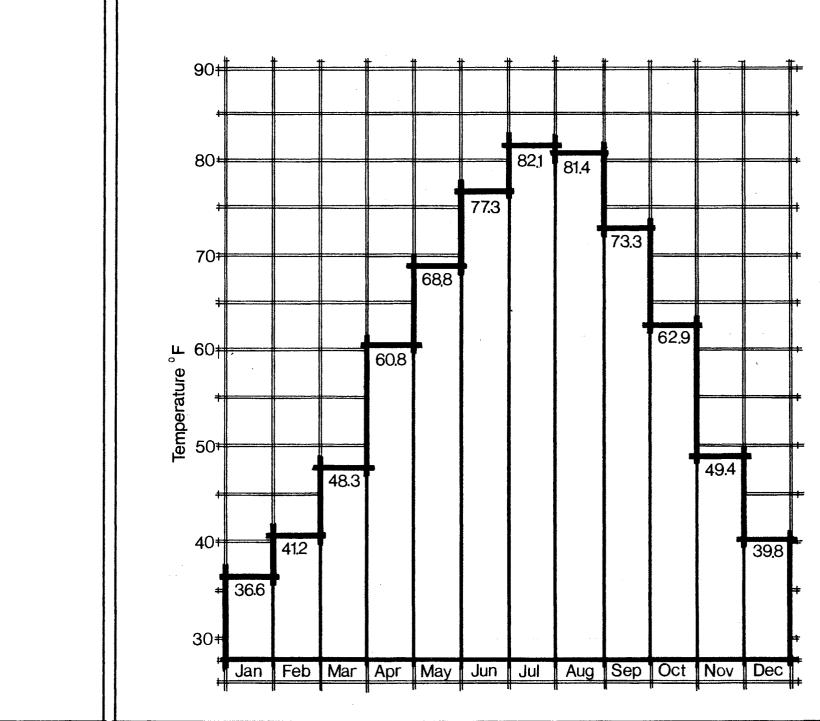


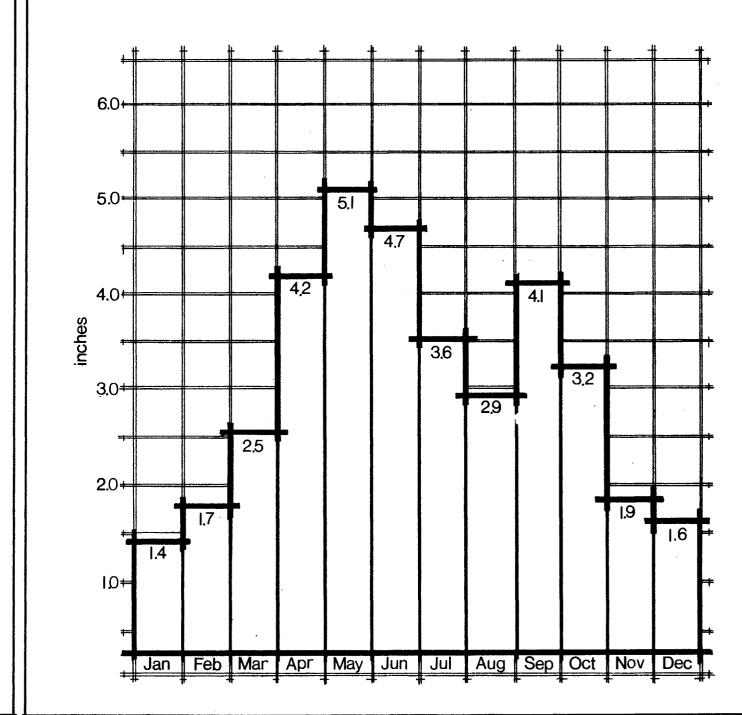
SOLAR ALTITUDE

- B January 22 November 22
- C Febuary 22 October 22
- D March 22 September 22
- E April 22 August 22
- F May 22 July 22
- G June 22

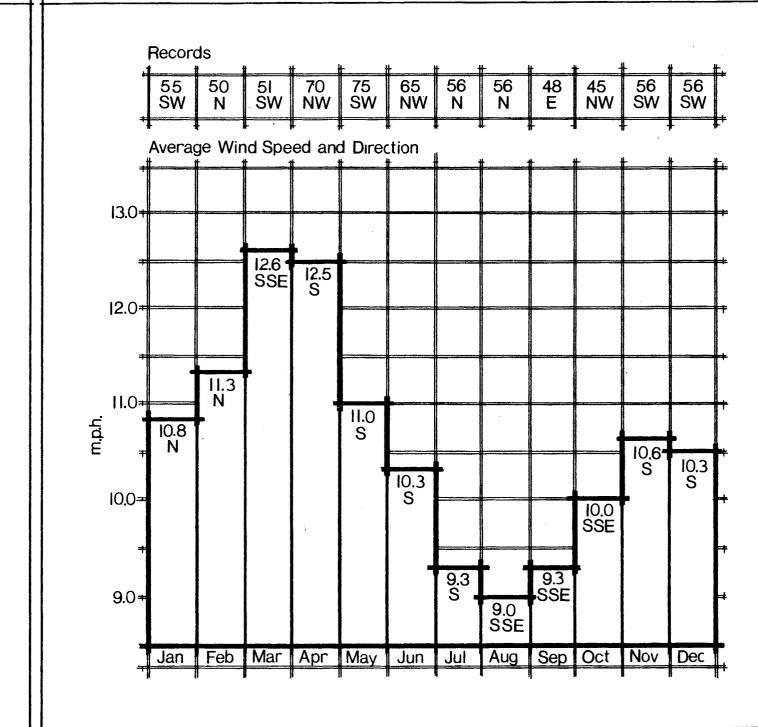


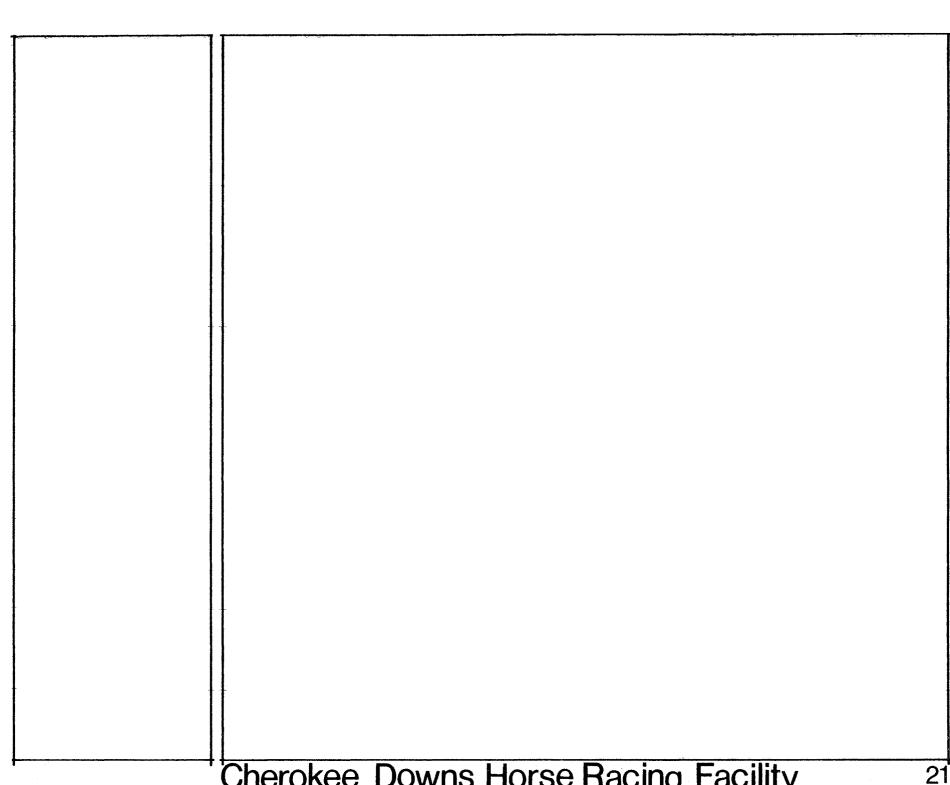






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#### PARKING

Valet	480 spaces	168000 S.F.
Preferred	800 spaces	280000 S.F.
General Public	4800 spaces	1680000 S.F.
Charter Bus	50 spaces	40000 S.F.
Horsemen w/ trailers	950 spaces	600000 S.F.

#### **BACKSTRETCH**

Horses Stables	279350 S.F.
Horsemens Dormitories and related faci	ilities 29690 S.F.

#### HOSPITAL

Horse Hospital and facilities 14000 S.F.

#### PADDOCK

Paddock House 9216 S.F.
Parade Ring 24000 S.F.

#### RACING SURFACES

Main Dirt racing surface

Main Turf racing surface

Steeple Chase racing surface

Quarterhorse racing surface

Traing Track

1 Mile Oval

7/8 Mile Oval

3/4 Mile Oval

1/4 Mile Straight

3/4 Mile Oval

#### **GRANDSTAND**

Public Grandstand facility 414905 S.F.

#### TOTAL BUILDING AREA

717471 S.F.

Cherokee Downs Horse
Racing Faciltiy, like
all major tracks breaks
down into four basic
areas.

- 1 Backstretch
- 2 Parking
- 3 Grandstand
- 4 Racing Surfaces

The Paddock acts as a transitional area from the Backstretch to the Racing Surfaces by way of the Grandstand, and the Apron acts as a transitional area between the Grandstand and the Racing Surfaces

Types of relationships, typical on all diagrams

PUBLIC

Primary

Secondary

HORSES

Primary

 $\bigcirc\bigcirc\bigcirc\bigcirc$  Secondary

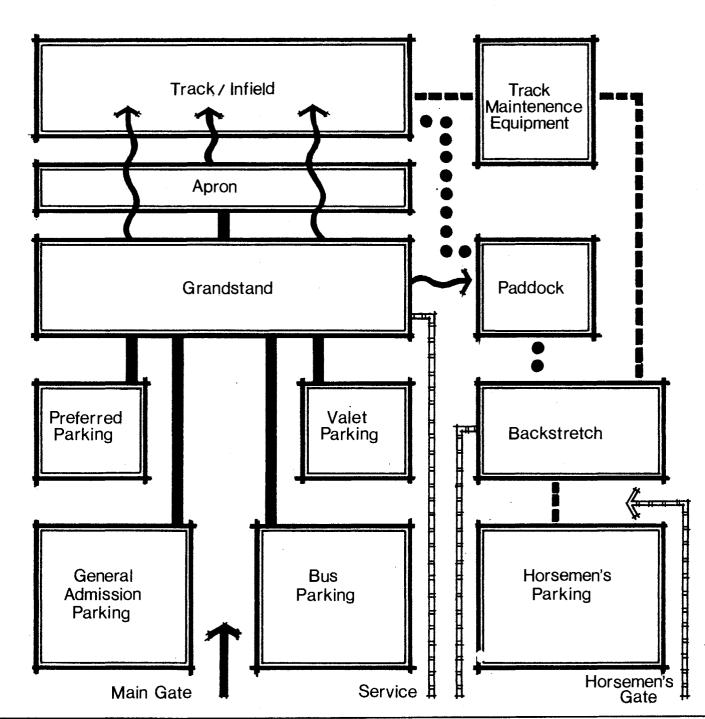
STAFF and HORSEMEN

**■** Primary

□□□ Secondary

VIEWS





BACK	STRETCH

В1	Security Office and Horsemen's Gate	150
B2	Horsemen's Offices	1670
В3	Tack/Tack Repair/Blacksmiths Shop	2600
B4	Feed Storage	18000
B5	Stables and Dormitories	040ر36
в6	3/4 Mile Training Track	
В7	Dining and Recreation Building	5000
в8	Horse Hospital	14000
	BACKSTRETCH TOTAL	350460 S.F.

## **PADDOCK**

P1	Parade Ring and Saddling Stalls	25728
P2	Identification Area	240
Р3	Lobby	1500
P4	Registration	700
P5	Racing Stewards	240
P6	Racing Secretary	240
P7	Files	120
P8	Passes	170
P9	Public Toilets	200
P10	Jockey Locker Room	1600
P11	Jockette Locker Room	300
P12	Common Areas - Laundry/Massage/Sauna	645
P13	Dormitory	225
P14	Jockey Lounge	1100
P15	Film Room	225
P16	Weight Room	200
	PADDOCK TOTAL excluding parade ring	9370 S.F.

## **ENTRANCE HALL**

E1 E2 E3 E4 E5 E6 E7 E8	Entrance Hall Circulation Core Public Grand Hall Public Hall Cashiers and Sellers Concessions Public Hall Bars Public Toilets Support Facilities	8750 4500 per floor 49500 4500 4000 2000 4500 15350
	ENTRANCE HALL TOTAL	93000 S.F.
SUP	PORT	
T1	Security Office	300
T2	Security and Para-Mutuel Staff Locker Room	400
T3	First Aid Office	250
T4	Printing Department	600
T5	Supply Office	200
T6	Central Maintenence Office	150
T7	Office Supply Storage	200
т8	Food Supply Storage	400
Т9	Janitorial Supplies	200
T10	Receiving Area and Dock	400
	Trash Pick-up Area	200
T12	Staff Locker Rooms	1:320
	ENTRANCE HALL TOTAL	4620 S.F.

GEN	IERAL PUBLIC	
G1 G2 G3 G4 G5 G6	General Public Hall General Public Seating Public Lounge General Public Sellers and Cashiers Concessions General Public Bars Public Toilets	40000 40000 2250 4500 4000 1200 3000
	GENERAL PUBLIC TOTAL	94950 S.F.
CLU	BHOUSE	
C1 C2 C3 C4 C5 C6 C7 C8 C9	Clubhouse Hall Box Seats Table Seating Clubhouse Hall Sellers and Cashiers Concessions Clubhouse Bars Jockey Club Lounge Kitchen Public Toilets General Storage	42900 45000 20000 3500 3750 1125 2000 7500 3000 2000
PEN	THOUSE SUITES	
\$1 \$2 \$3 \$4 \$5 \$6 \$7	Foyer Private Suites Toilets and Lounge Penthouse Sellers and Cashiers Kitchen Directors Office General Storage	1800 33600 4000 1200 1200 1000

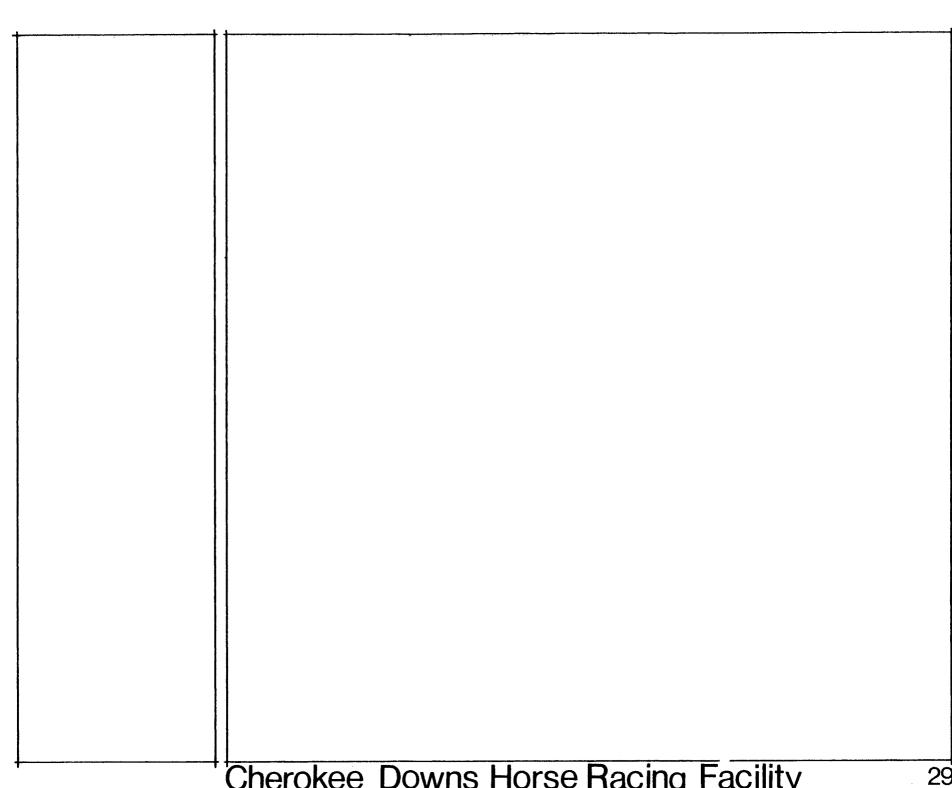
PENTHOUSE SUITES TOTAL

47300 S.F.

M1	Money Room	1875
M2	Vault	120
M3	Ticket Check	700
M4	Mutuels Room	360
M5	Computer Room	625
M6.	Maintenence Room	220
M7	Manager's Office	250
м8	Tax Collectors Office	250
м9	Paper Storage	700
	Staff Toilets	220
M11	Circulation Areas	1400
	PARA-MUTUELS TOTAL	6720
RAC	ING OFFICIALS	
		300
R1	Judges Booth	300 200
R1 R2	Judges Booth Announcers Booth(Track, Radio, and T.V.)	•
R1 R2 R3	Judges Booth Announcers Booth(Track, Radio, and T.V.) Press Room	200
R1 R2 R3 R4	Judges Booth Announcers Booth(Track, Radio, and T.V.) Press Room Staff Toilets	200 500 200 400
R1 R2 R3 R4 R5	Judges Booth Announcers Booth(Track, Radio, and T.V.) Press Room	200 500 200 400 400
R1 R2 R3 R4 R5 R6	Judges Booth Announcers Booth(Track, Radio, and T.V.) Press Room Staff Toilets Photo Finish Equipment T.V. Room	200 500 200 400
R1 R2 R3 R4 R5	Judges Booth Announcers Booth(Track, Radio, and T.V.) Press Room Staff Toilets Photo Finish Equipment	200 500 200 400 400

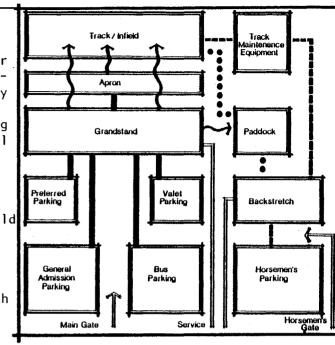
## <u>ADMINISTRATION</u>

A1 A2 A3 A4 A5 A6 A7 A8 A9 A10 A11	Lobby and Reception Area President's Office Conference Room Press Room Secretarial Area Mail Room General Manager's Office Assistant General Manager Accounting Department General Offices Computer Room Coffee Bar	780 660 950 200 270 135 200 150 1400 550 150
A13 A14	Staff Toilets General Storage	70 300 200
	ADMINISTRATION TOTAL  FACILITY TOTAL	6215 S.F. 



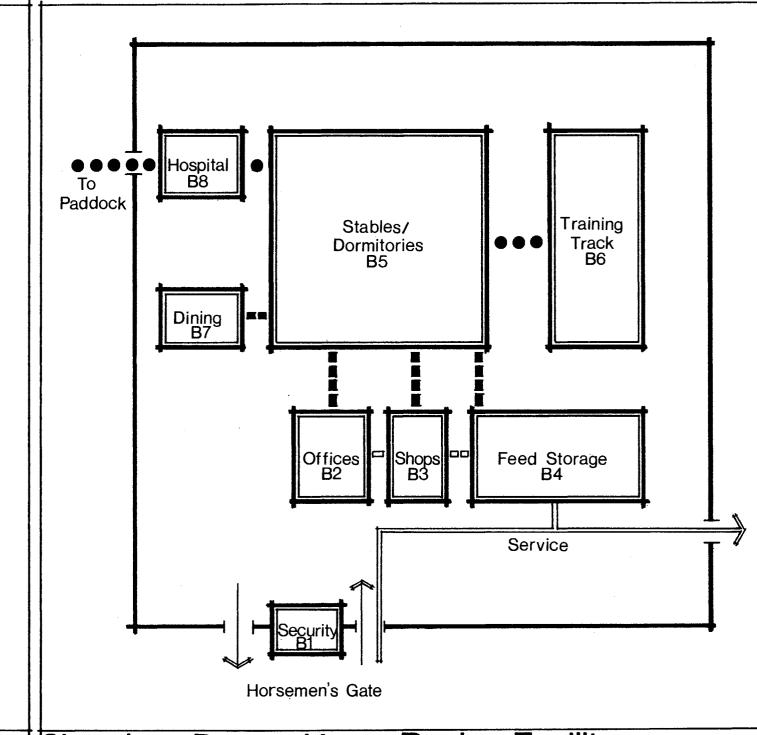
## **Backstretch**

"Backstretch" is a term commonly used to refer to the horsemen's area. This area contains all facilities associated with the horses and their care. The Backstretch would be a facility operated year-round, serving as a training facility during the off-season. A Horse Hospital would also be located in the Backstretch area serving the horses boarded at the facility, the general population, and performing post-race examinations. The image of the Backstretch area might be low key and natural, blending in with the natural setting, and preserving as many trees as possible. Furthermore, the Backstretch should be designed to enhance the complex visually, and function with the shortest and most direct access to the Paddock and Track. Finally, the Backstretch is a high security area, limiting access to only those persons with a Backstretch pass.



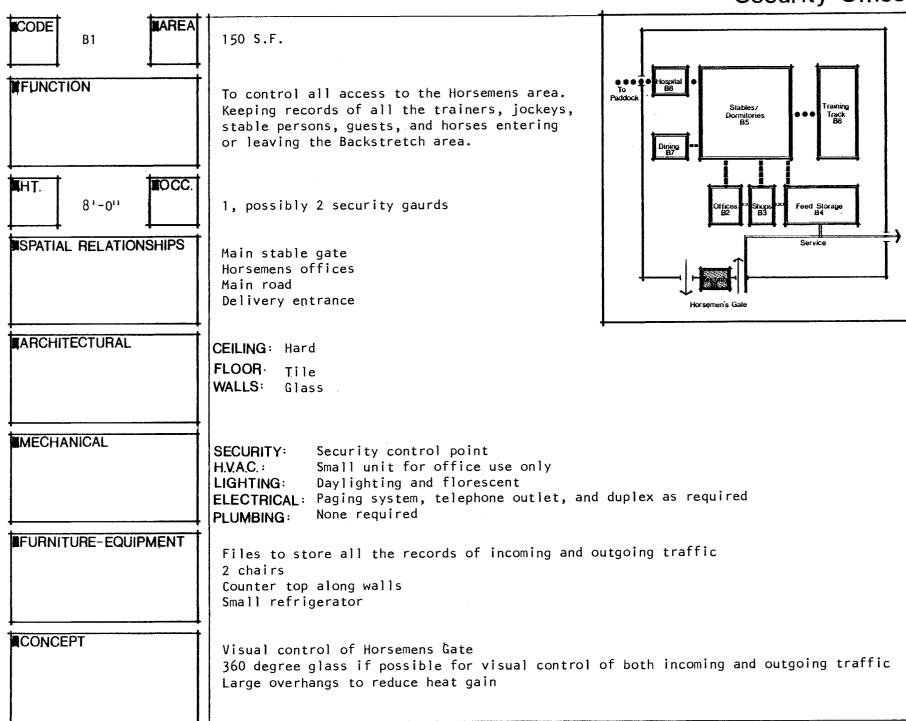
#### Space Requirements

В1	Security office and Horsemens gate		150	S.F.
B2	Horsemens offices		1670	S.F.
В3	Tack/Tack Repair/Blacksmiths Shop		2600	S.F.
в4	Feed Storage		18000	S.F.
B5	Stables and Dormitories		309040	S.F.
в6	3/4 Mile Traing Track		- ' -	
В7	Dining and Recreation Building		5000	S.F.
в8	Horse Hospital		14000	S.F.
	7	Total	350460	S.F.



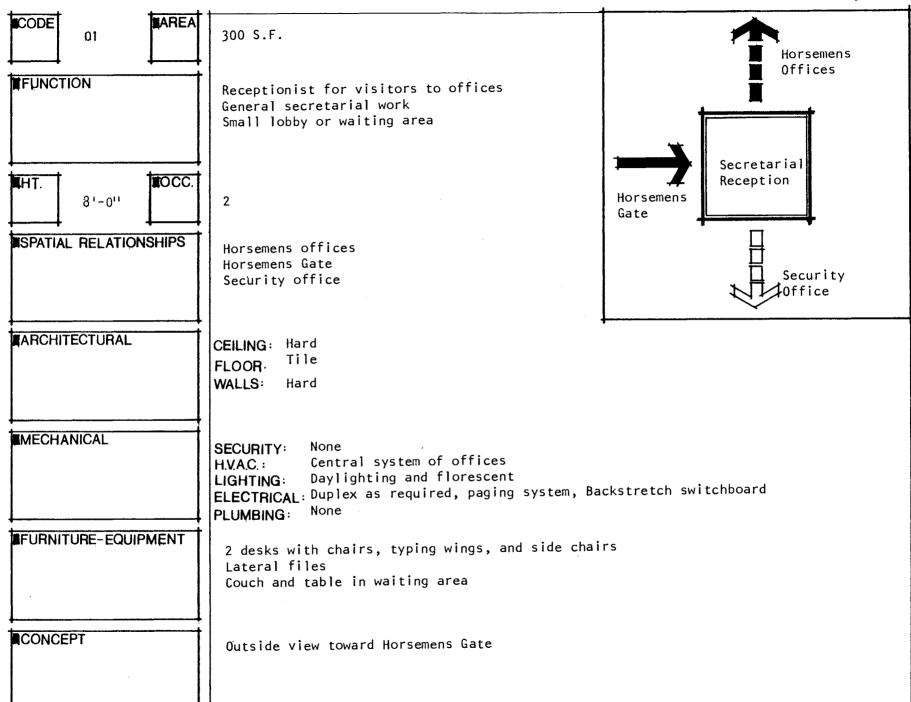
Cherokee Downs Horse Racing Facility

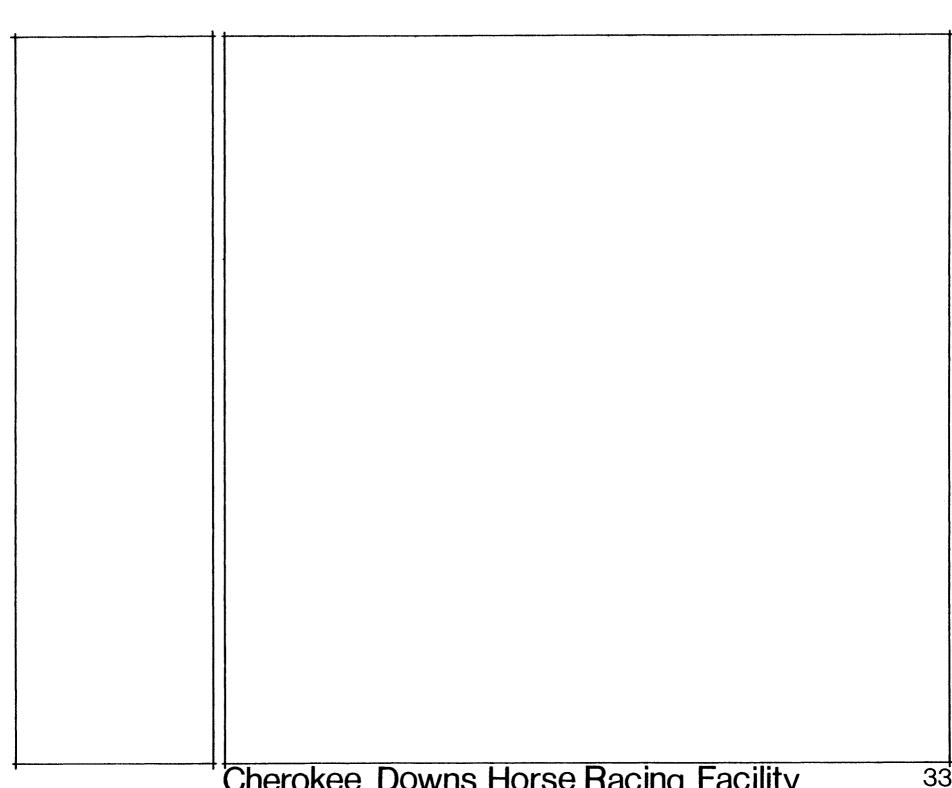
Security Office



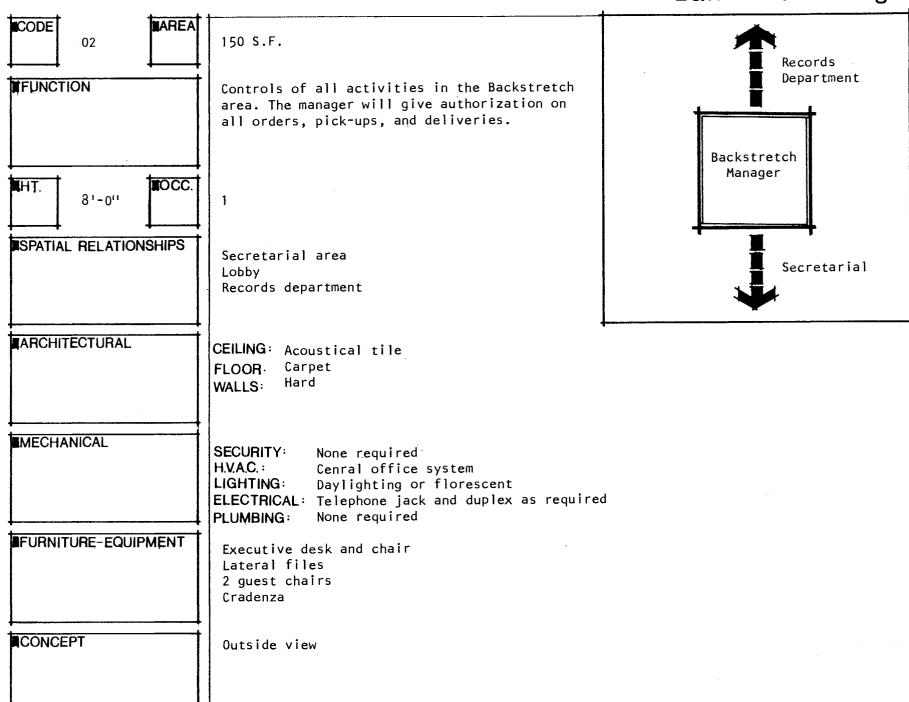
Cherokee Downs Horse Racing Facility

## Reception



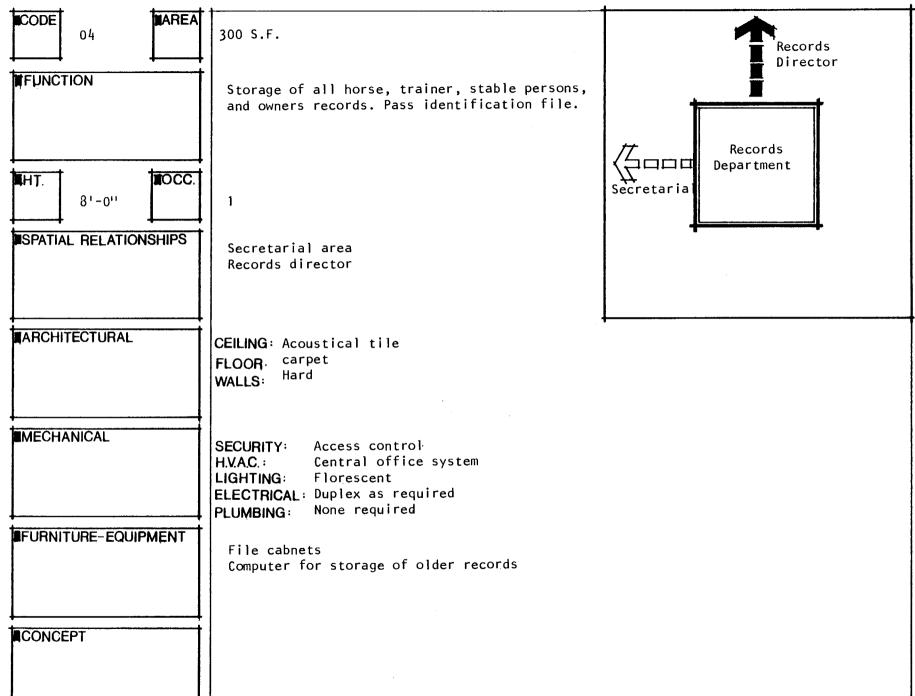


## Backstretch Manager

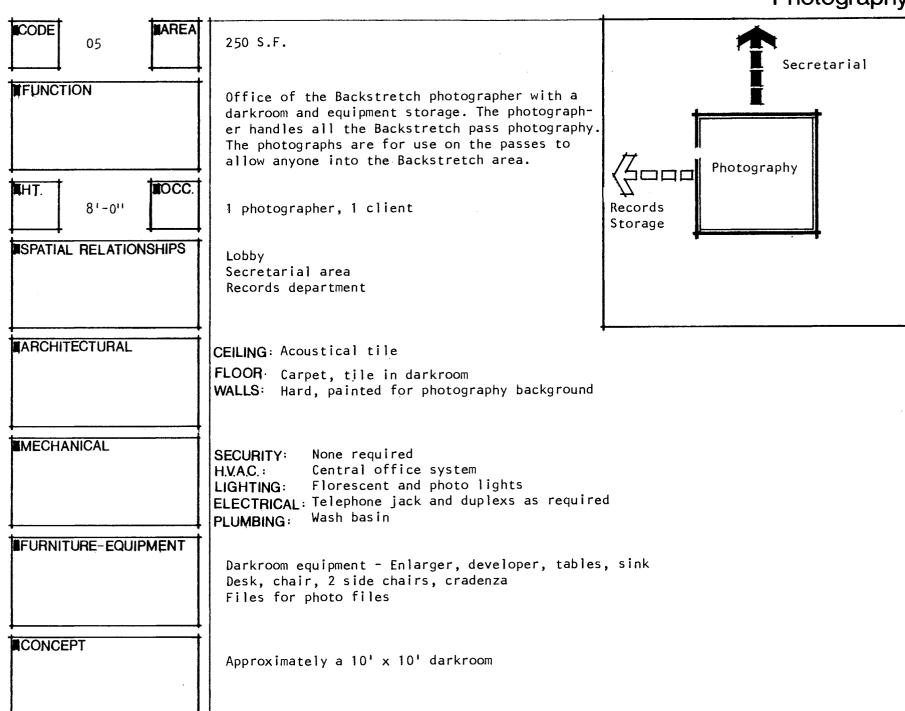


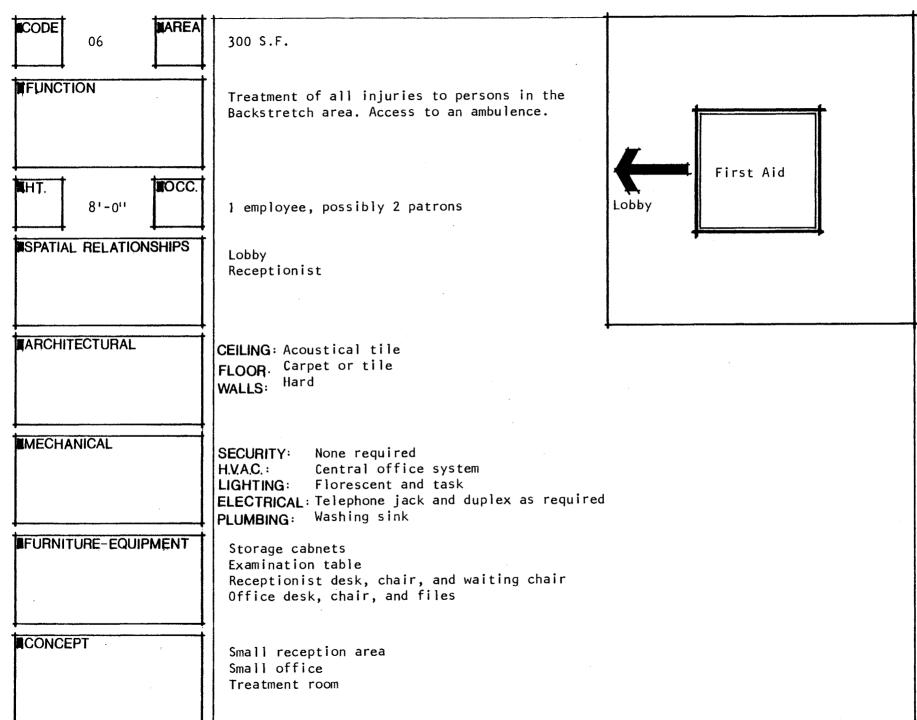
#### Records Director/Accounting AREA CODE 300 S.F. 03 Secretarial **FUNCTION** Management and updating of all records of the Backstretch area. Also will contain a small accounting department for the management of th Backstretch finances. Director/ Accounting TOCC. MHT. Backstretch Records 81-011 1 records director, 1 accountant Storage Manager **MSPATIAL RELATIONSHIPS** Records storage Secretarial area Lobby Backstretch manager **ARCHITECTURAL** CEILING: Acoustical tile FLOOR Carpet WALLS: Hard MECHANICAL Access control. SECURITY: Central office system H.V.A.C.: Florescent LIGHTING: ELECTRICAL: Telephone jack and duplex as requires None required PLUMBING: **AFURNITURE-EQUIPMENT** 2 desks and chairs with side chairs 2 cradenzas File cabnets CONCEPT

#### Records Department

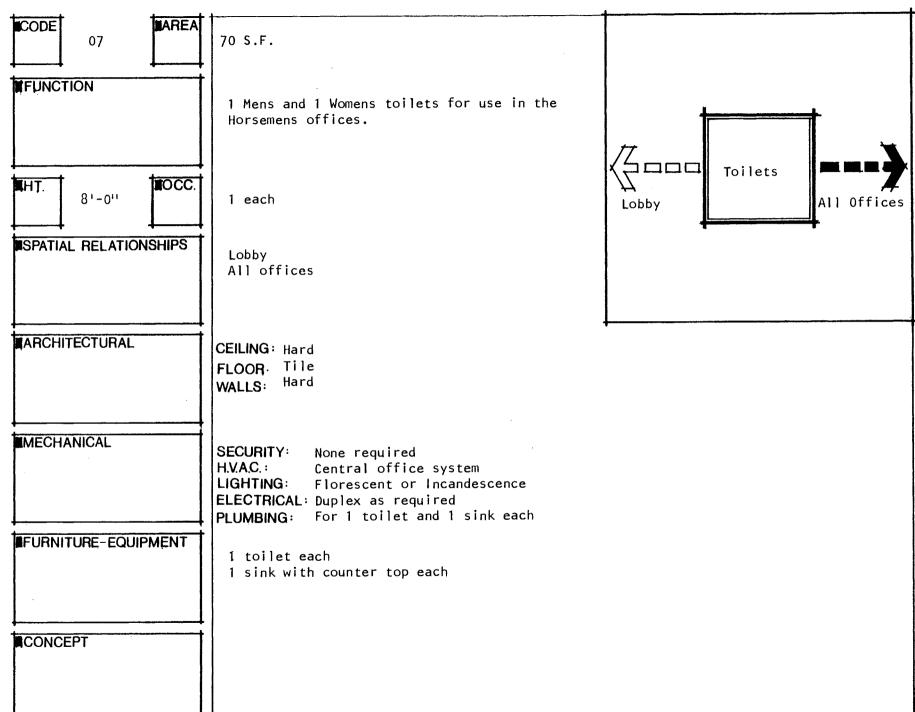


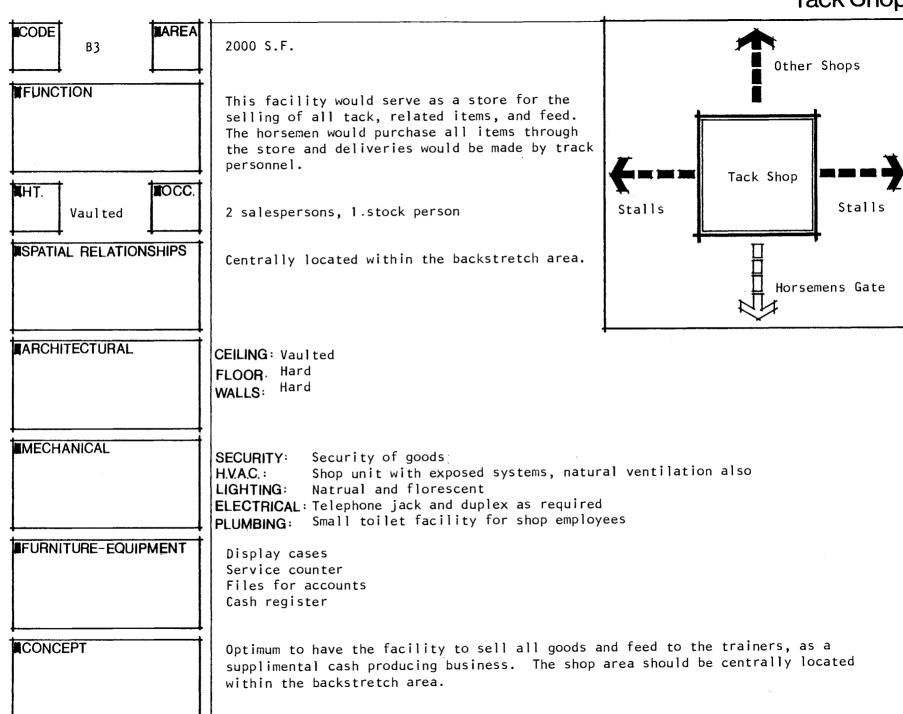
Photography





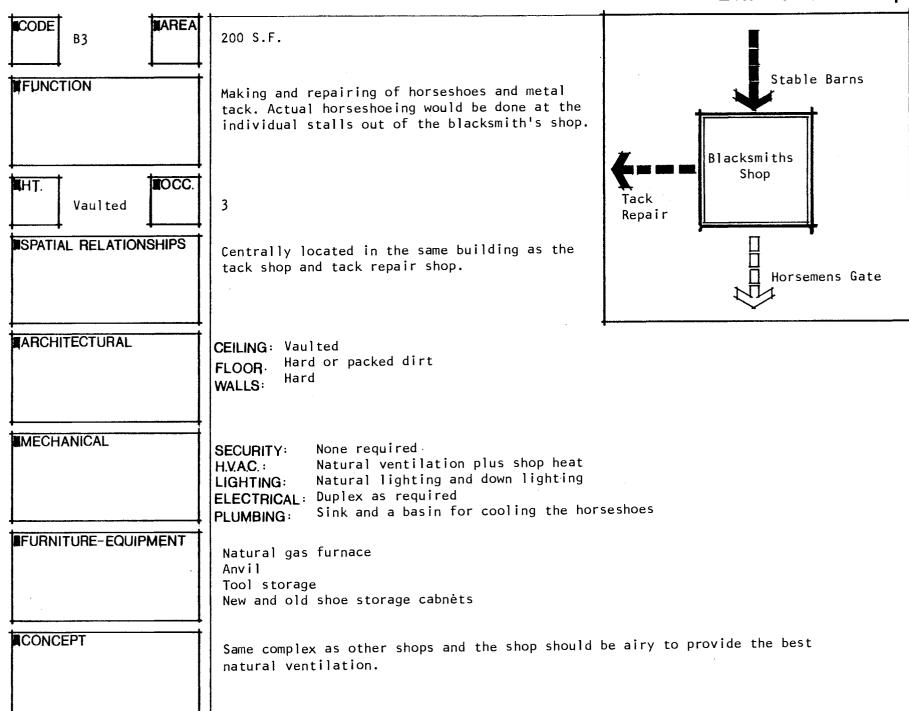
#### Staff Toilets



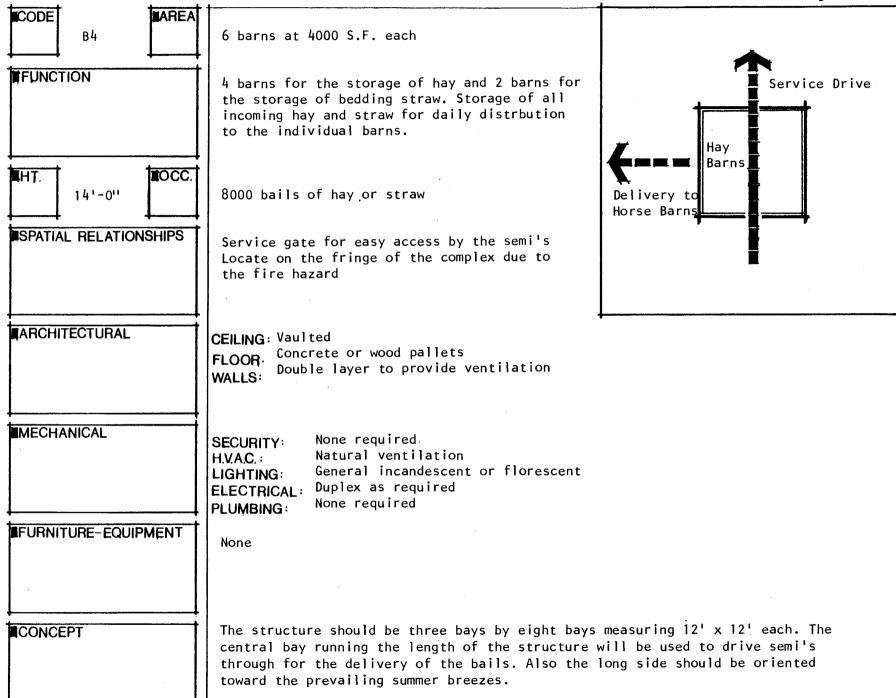


Tack Repair CODE MAREA 600 S.F. В3 Stable Barns FUNCTION Repair of all tack and equipment used in the backstretch area. Tack Repair MOCC. HT. Blacksmith Tack Shop 2 Vaulted SPATIAL RELATIONSHIPS Centrally located within the backstretch and located with the tack shop and the blacksmith Hosemens Gate shop. **ARCHITECTURAL CEILING:** Vaulted Hard FLOOR. Hard WALLS: **EMECHANICAL** SECURITY: None required Shop system and natural ventilation H.V.A.C.: LIGHTING: Natural and florescent ELECTRICAL: Telephone jack and duplex as required Smaa sink PLUMBING: **AFURNITURE-EQUIPMENT** Work benches Tool storage Tack storage CONCEPT Same complex as the tack shop and the blacksmith shop.

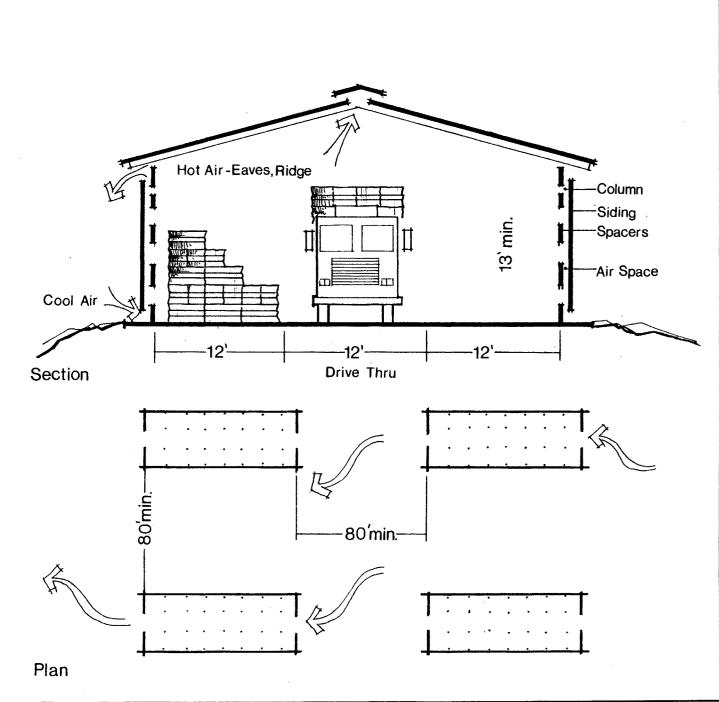
## Blacksmith Shop



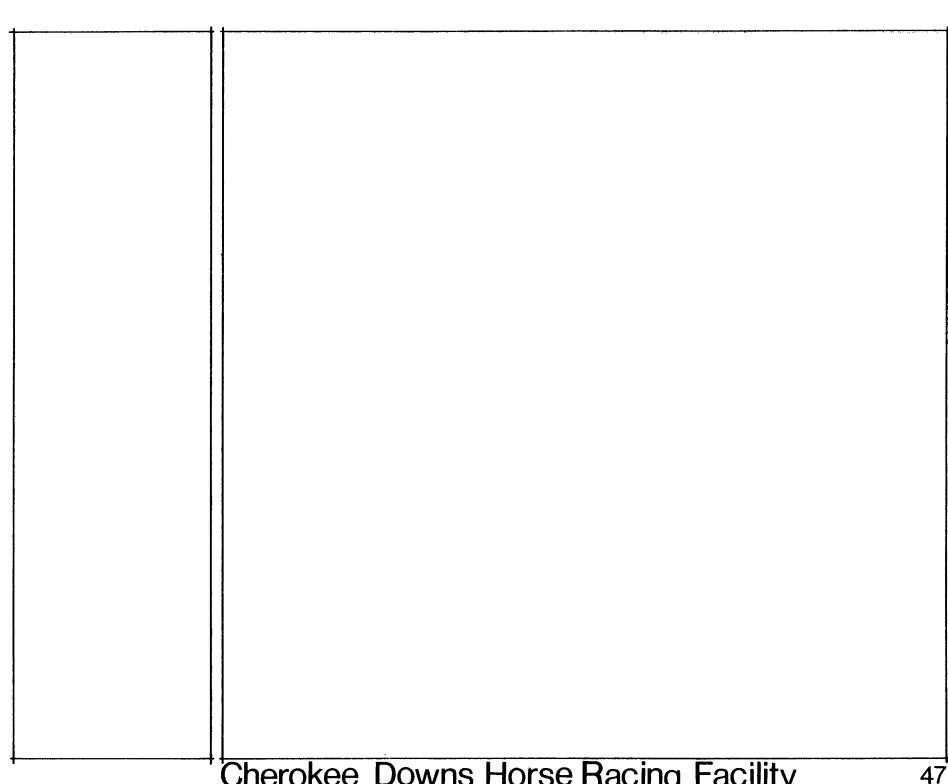
Hay Barns



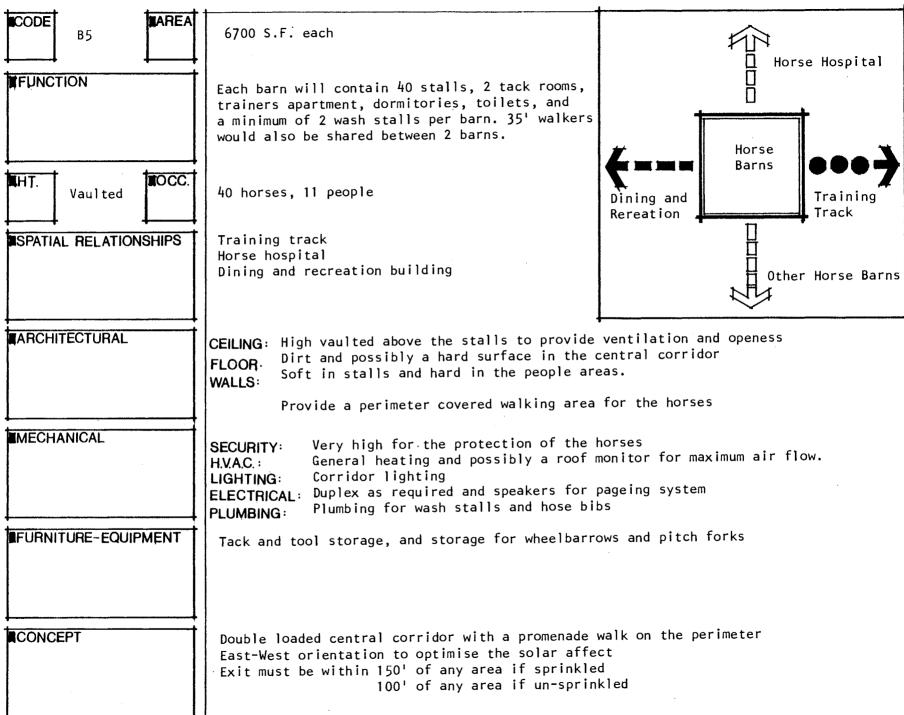
For the storage of hay and straw, it has been proven that an enclosed barn offers the best protection from the elements. The bay size is based on the size of the actual hay bales and of the equipment used to deliver and stack the hay. The optimum bay size has been proven to be 12' x 14' which can accomidate 36 bales per row which approximates 1. ton of hay which is then easy to inventory. Their should also be a central bay for a large semi to drive-thru to deliver the hay, the dimensions of this bay should be 12' wide by 14' tall. The barns should be at least 75' apart not only for the easy movement of the semis, but also due to the fire hazard. The hay is stored green and very high temperatures are produced as the hay cures, therefore, the hot air must be allowed to escape. Also, the long side of the building should be orientat→ ed toward the prevailing summer breezes. The configuration shown allows for natural vent



## Cherokee Downs Horse Racing Facility



Horse Barns

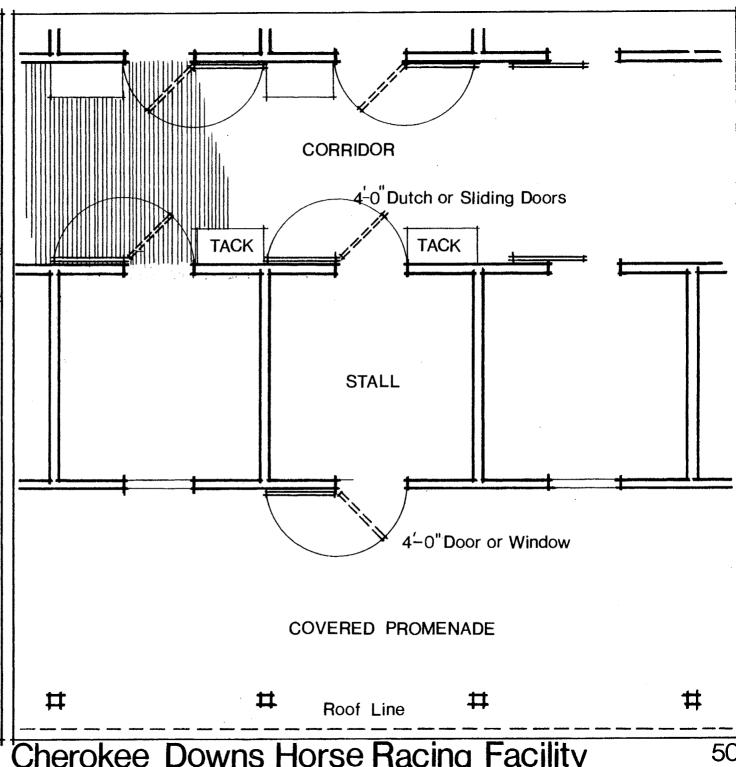


		·	
B5 B5	144 S.F.  To house the horse for eating, sleeping and grooming. Sometimes the stalls might be used	Exercise Areas	
MHT. MOCC.	as extra tack rooms or dormitory rooms.		
Vaulted	1 horse	<del>▋</del> <del>┃</del> ·	
ISPATIAL RELATIONSHIPS	Other stalls Tack rooms Dorm rooms Exercise areas		
<b>M</b> ARCHITECTURAL	CEILING: Open FLOOR. Dirt with a straw covering WALLS: Preferrably wood, possibly 2 x 8 T&G P.V.C those that are hard and would allow the ar		
MECHANICAL	SECURITY: High security from people H.V.A.C.: Natural ventilation with front and back openings and an open ceiling LIGHTING: Lighting in circulation areas and in each stall ELECTRICAL: 1 duplex per stall in circulation area PLUMBING: Within the length of a hose to a hose bib		
AFURNITURE-EQUIPMENT	Chain gaurd across doorway 2 panel door Window in the rear of the stall with a closeable Possible ceiling fan (optional)	door	
CONCEPT	Soft surfaces to prevent injuries Slope floor for drainage and ease of cleaning Open ceiling and best orientation for the best ve	entilation	

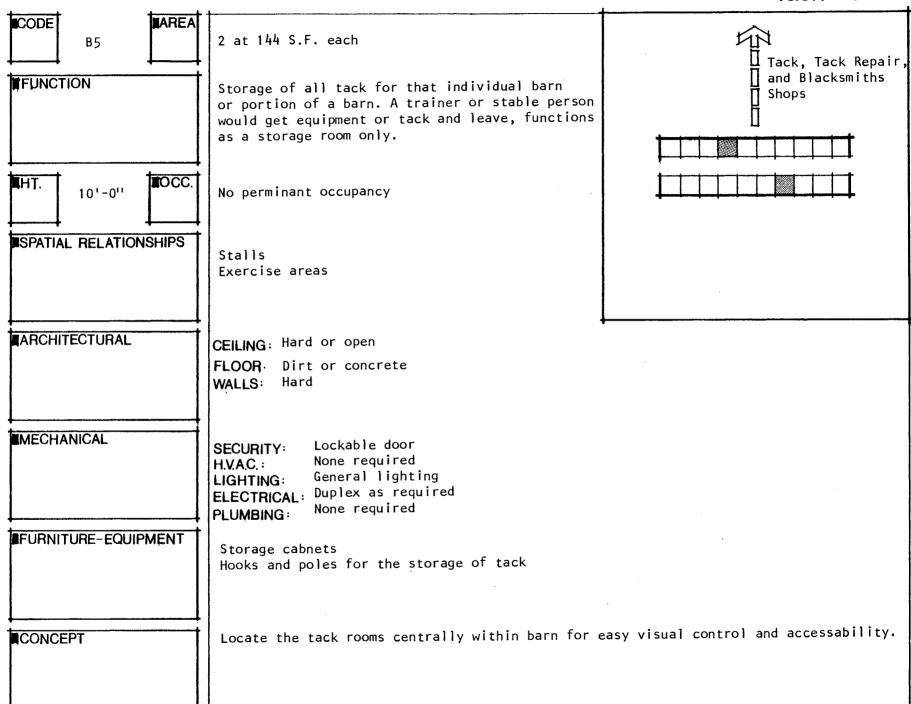
Cherokee Downs Horse Racing Facility

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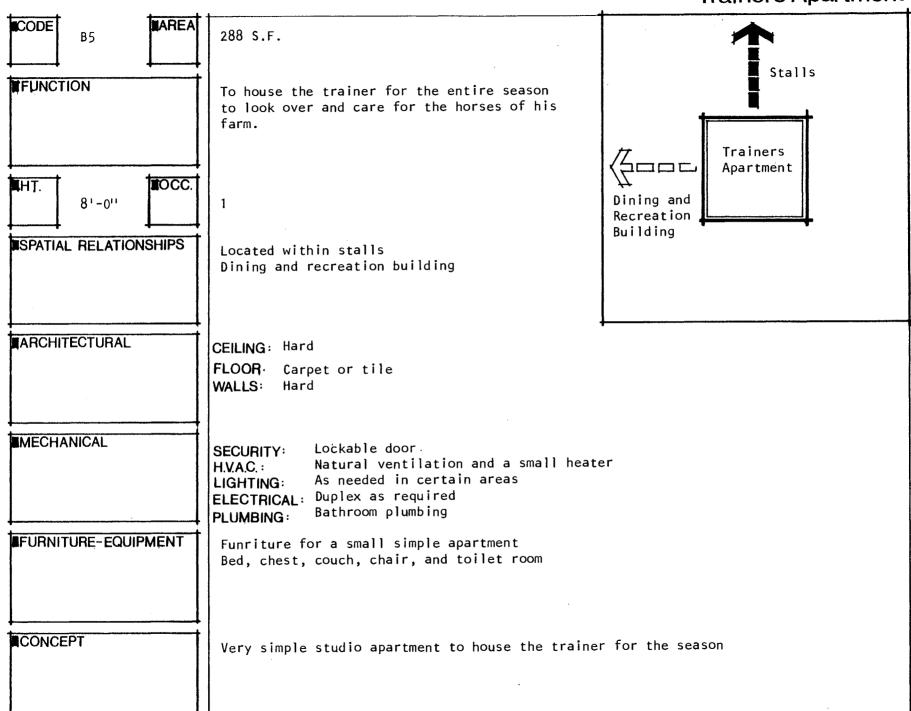
The optimum stall size has been determined to be 12' x 12' with a ceiling of 9-10'. The stalls should be allowed to open on to a center aisle which should also be on the 12' module. The front of the stall should contain a 4' wide dutch or sliding door to allow for both the horse and the keeper to move through freely. The back of the stall should also be a door or at least a window to allow for cross ventilation. The side walls of the stall should be solid up to a height of 5' with grillwork or open bars above that to allow ventilation and views for the horses to each other. The best flooring is a hard, porous clay sloping to the center for easy cleaning. Ventilation is vital and should be provided to allow 4 air changes per hour without creating a draft. The best material for stall construction is wood or P.V.C. with masonry being second above concrete or metal.

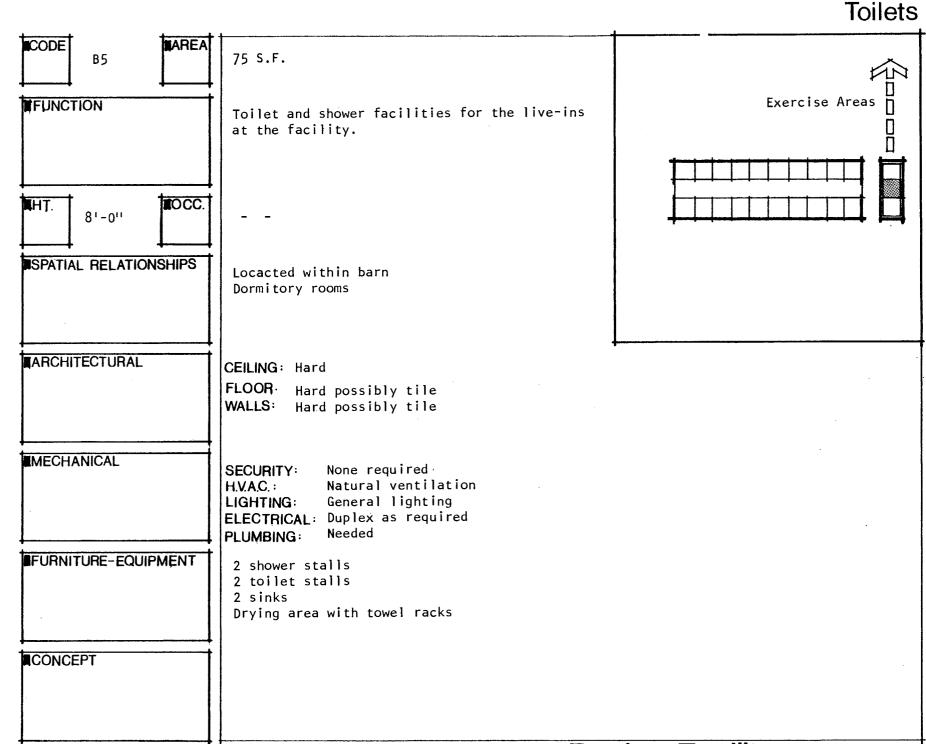


## Tack Rooms



## **Trainers Apartment**



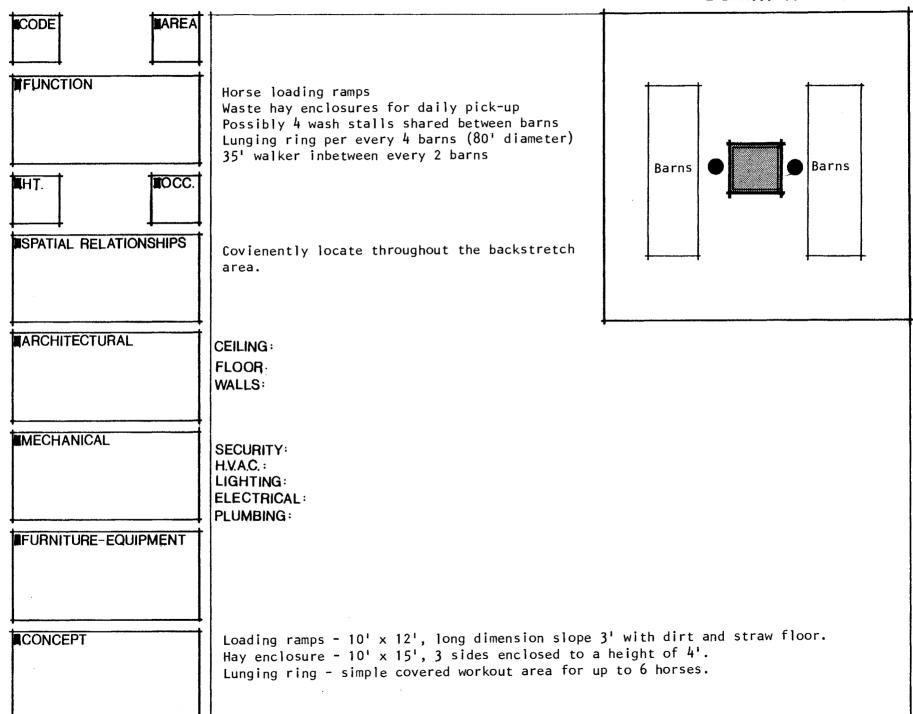


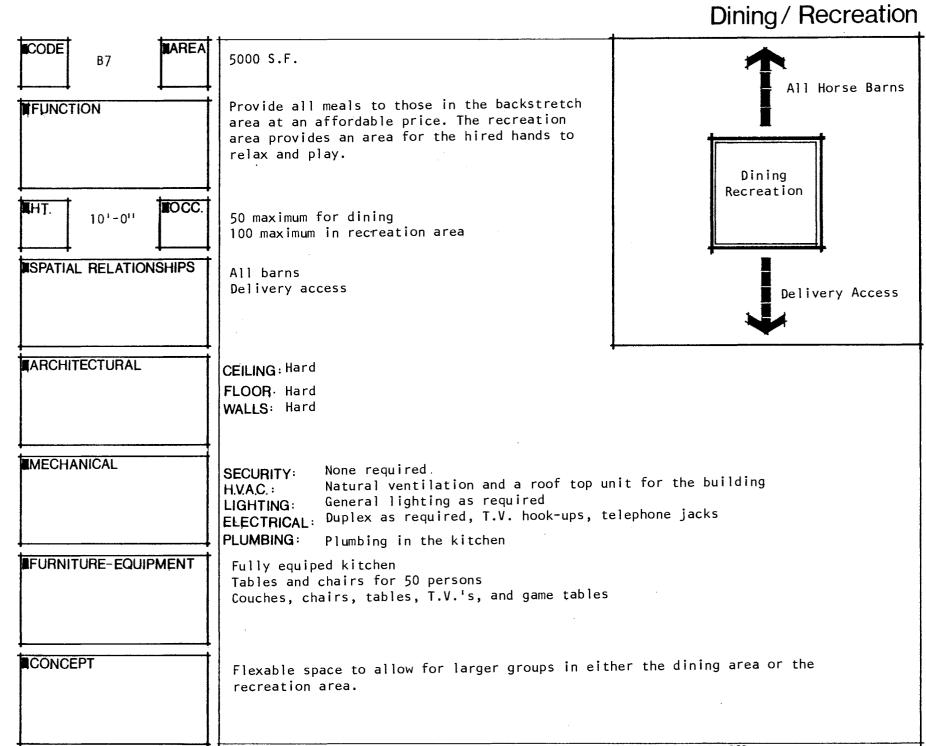
Training Track CODE MAREA В6 42000 S.F. Horse Hospital **MFUNCTION** All work-outs and traing is done on the 3/4 mile dirt training track. Training Track HOCC. HT. Varies 0pen SPATIAL RELATIONSHIPS All horse barns Horse hospital Horse Barns **ARCHITECTURAL** CEILING: FLOOR. WALLS: **EMECHANICAL** SECURITY: H.V.A.C.: LIGHTING: **ELECTRICAL:** PLUMBING: AFURNITURE-EQUIPMENT Small starting gate Spectator area CONCEPT Relaxing atmosphere with the possibility of natural shade

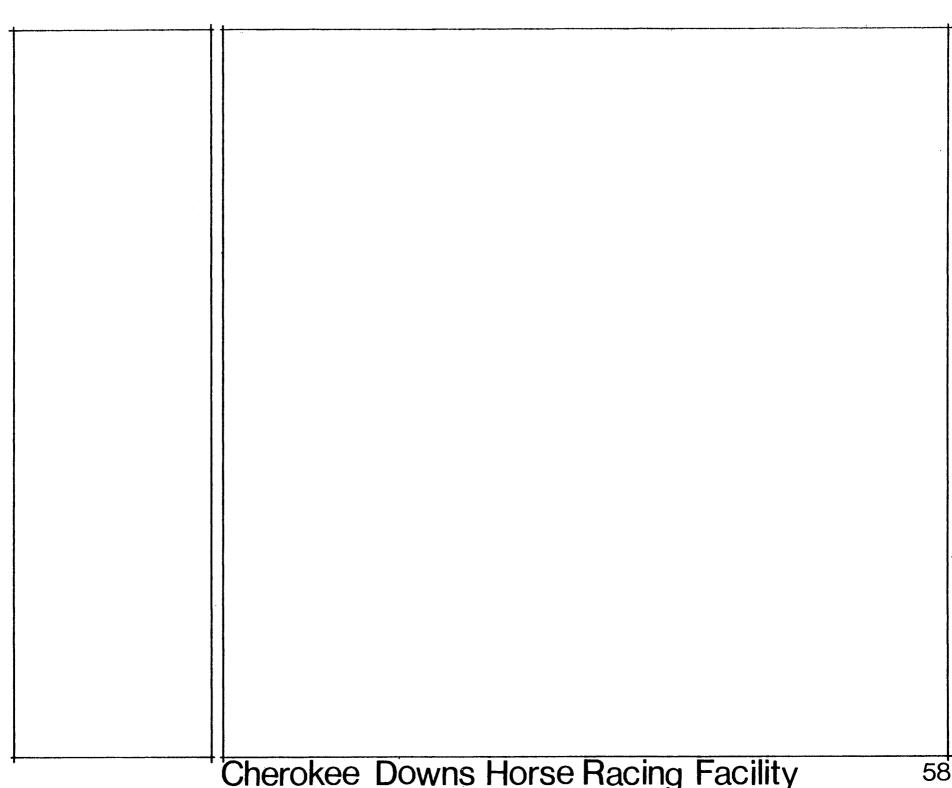
Cherokee Downs Horse Racing Facility

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#### Common Facilities

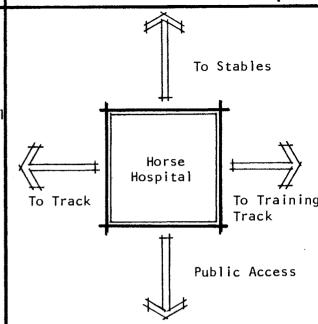






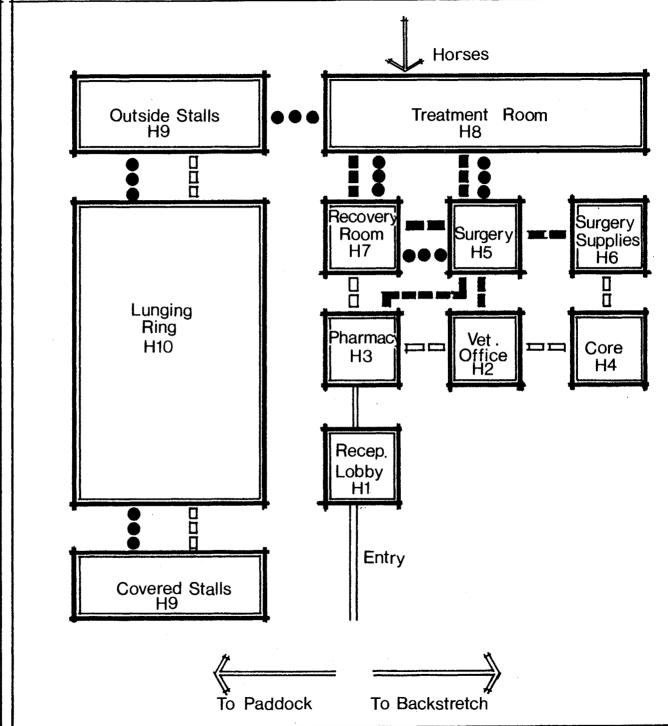
# Horse Hospita

This facility will provide both general practice and surgical needs for horses boarded at the facility as well as the general population. The facility includes a Pharmacy, Surgery room, Treatment area, Recovery stalls, and complete workout facilities for the total treatment of all horse injuries. Also, one of the primary functions of the facility will be the performance of random post race tests to reduce the risk of drugging the animals. The facility must be able to serve not only the horses admitted for treatment, but also provide outdoor waiting and walking areas for up to 20 horses. The location hould be such that the facility is convenient for post-race testing and for access to horsemen in need of the facility. The structure should be in a style compatable withe the other facilities in the Backstretch Area.



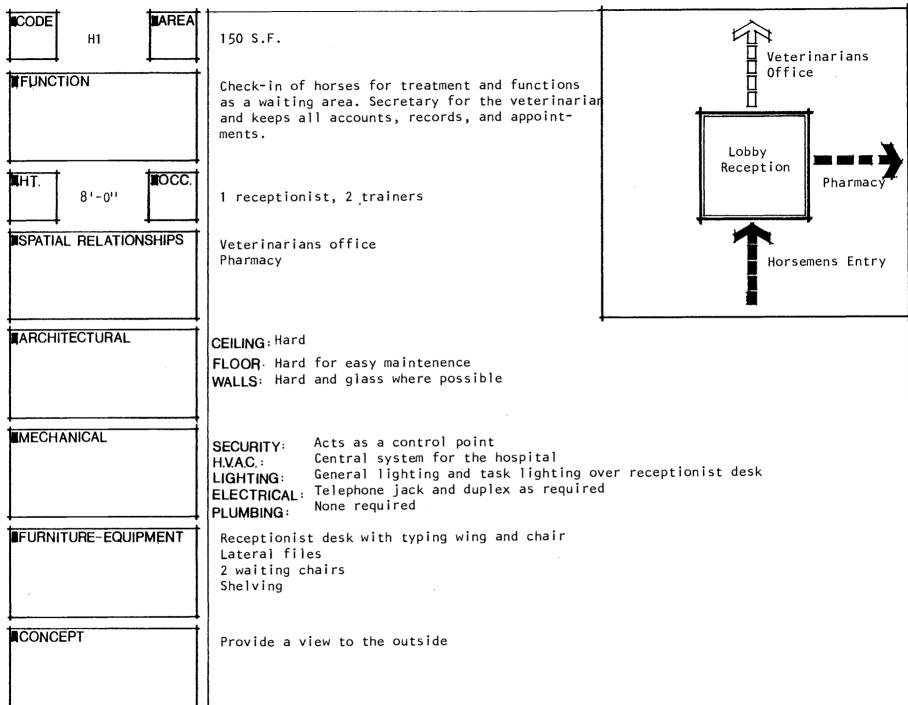
#### Space Requirements

Н1	Reception and Waiting		150 S.F.
H2	Vetenarian Office		225 S.F.
Н3	Pharmacy		225 S.F.
Н4	Storage/Toilets/Janitorial		150 S.F.
Н5	Surgery		400 S.F.
н6	Surgercal Supplies		200 S.F.
н7	Recovery Room		400 S.F.
н8	Treatment Room		1000 S.F.
Н9	Covered Stalls		2880 S.F.
H10	Lunging Ring		6600 S.F.
	•	Total	14000 S.F.

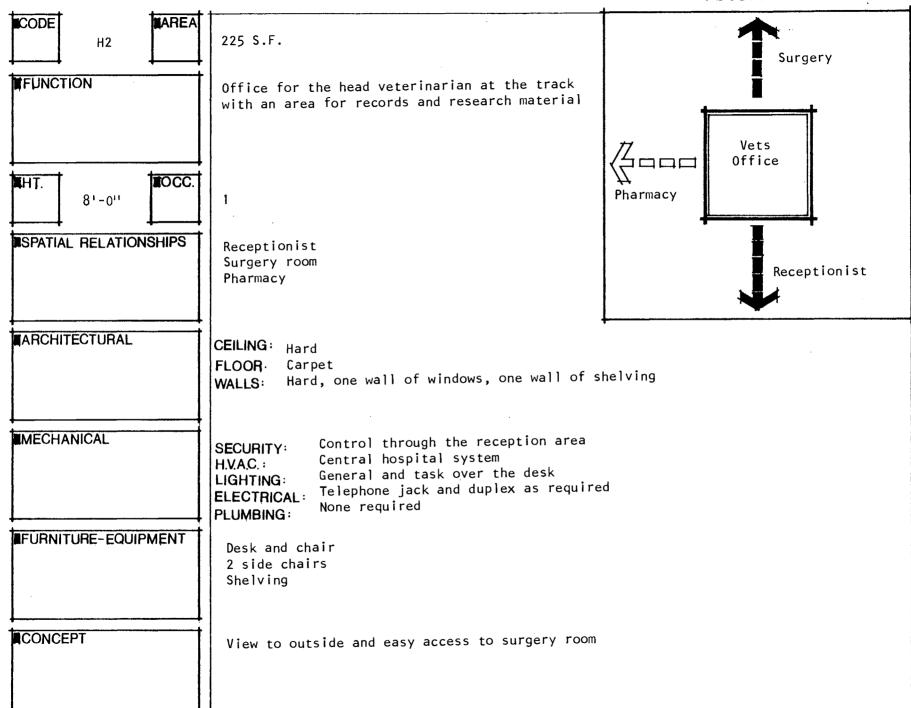


Cherokee Downs Horse Racing Facility

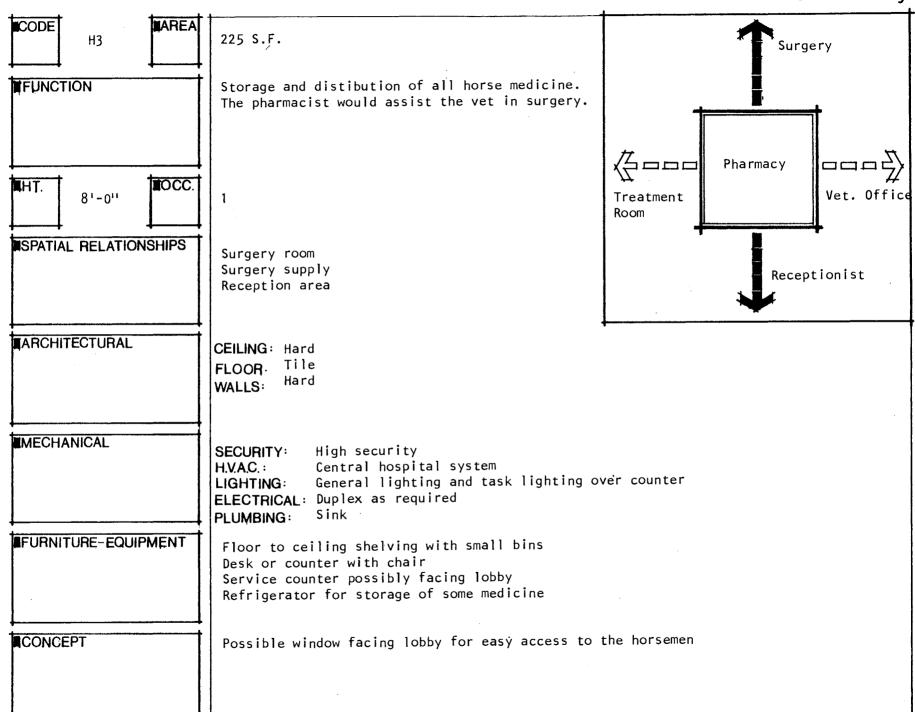
## Reception Lobby

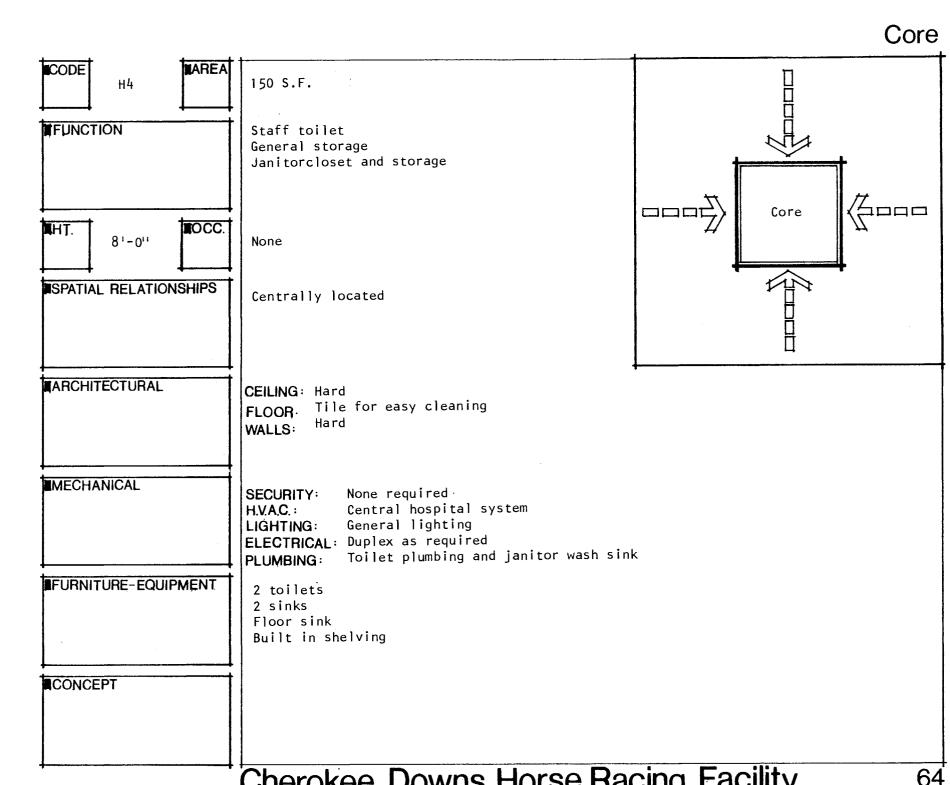


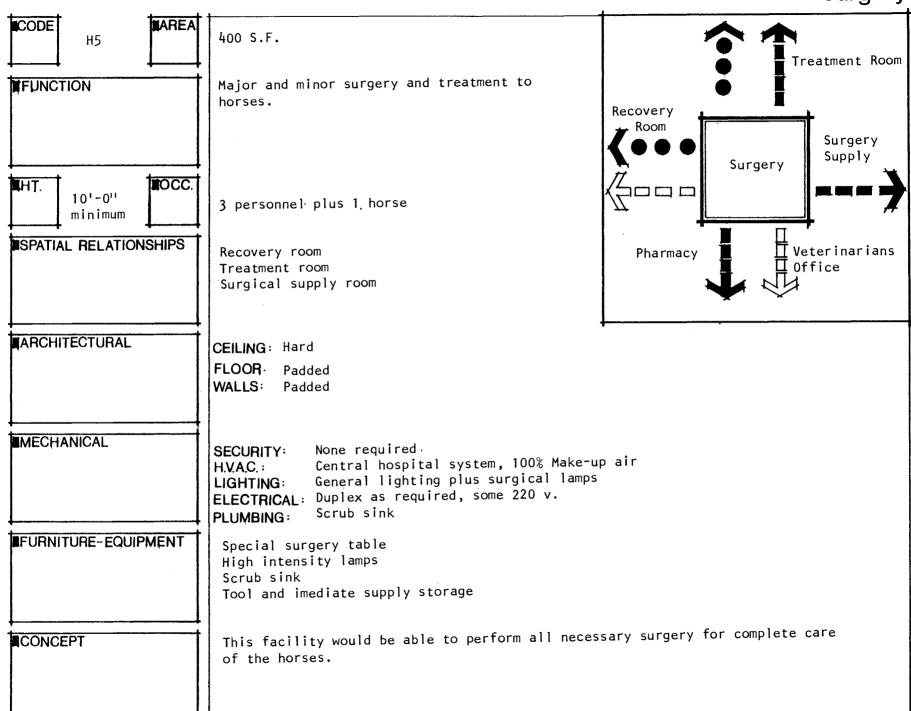
#### Veterinarian Office



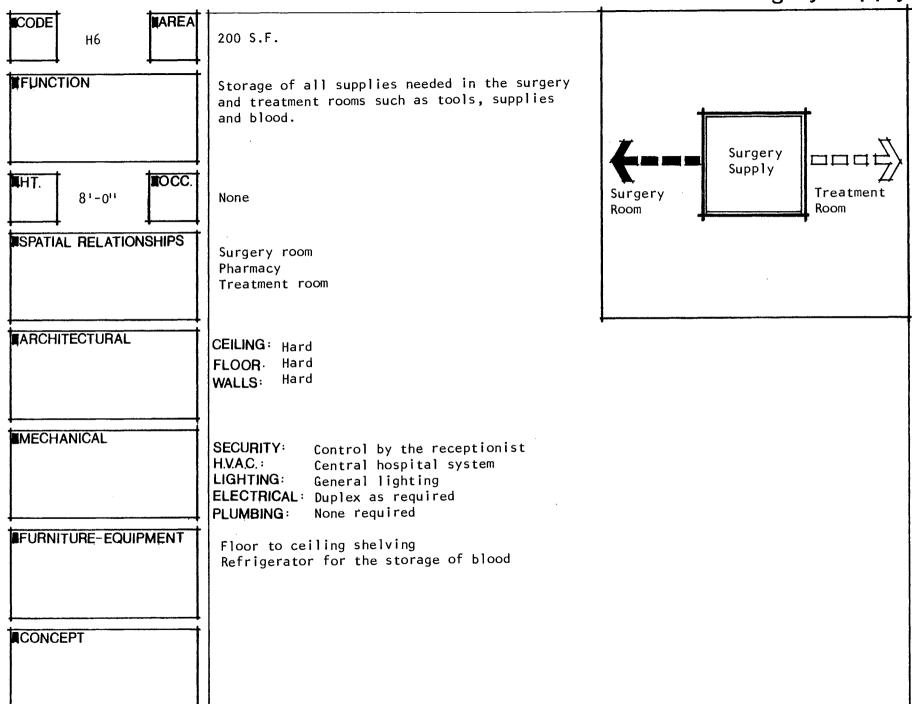
#### Pharmacy



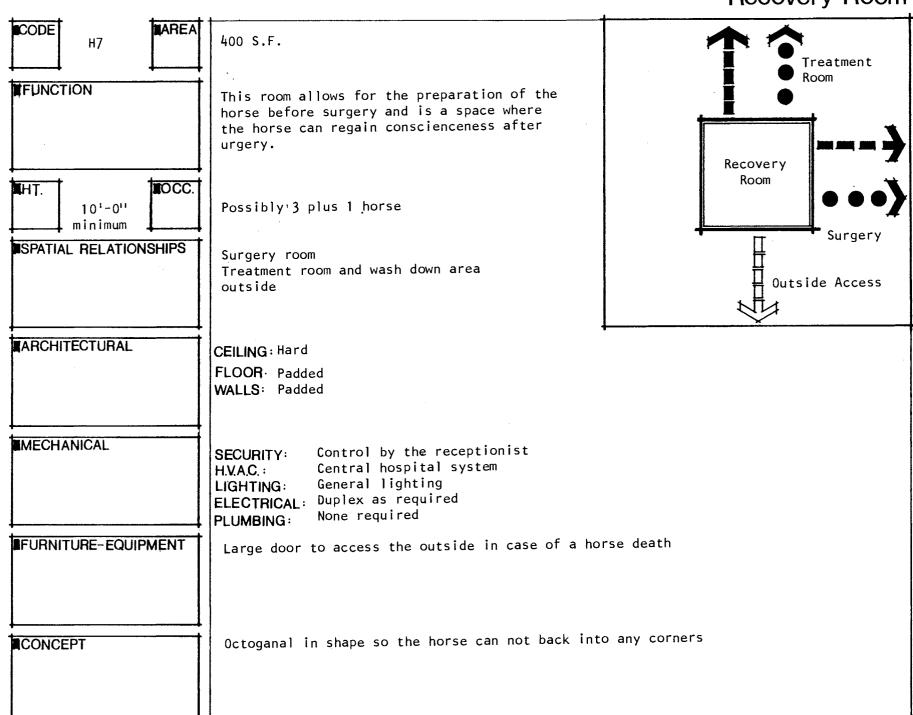




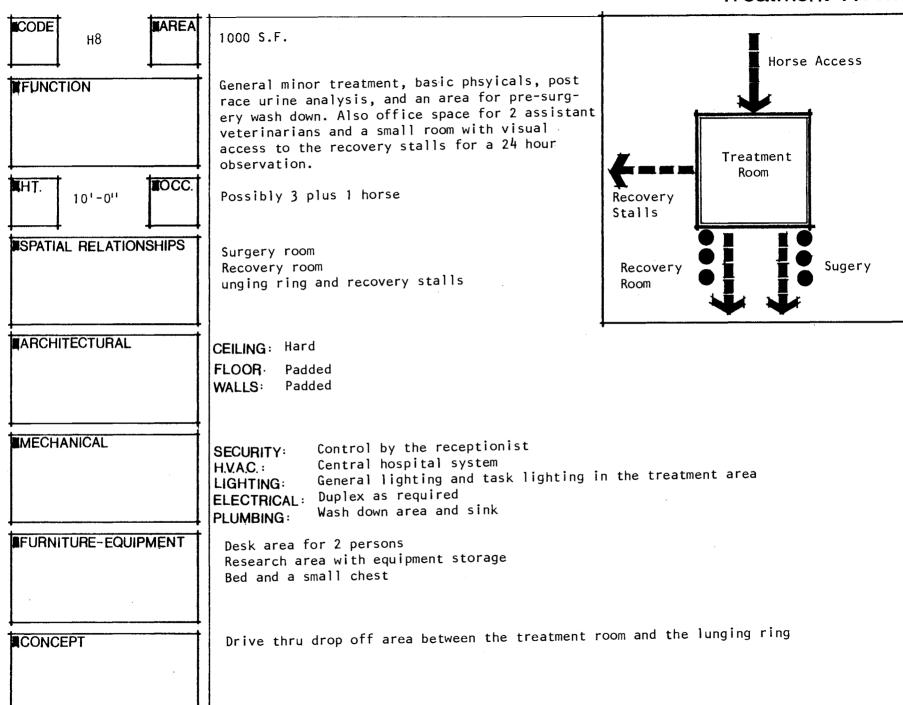
# Surgery Supply



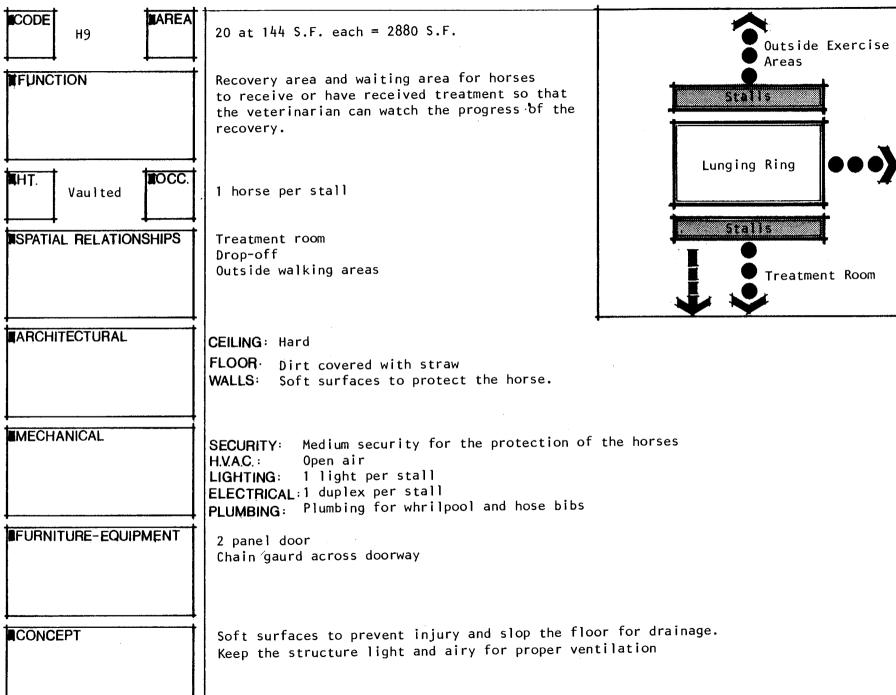
# Recovery Room



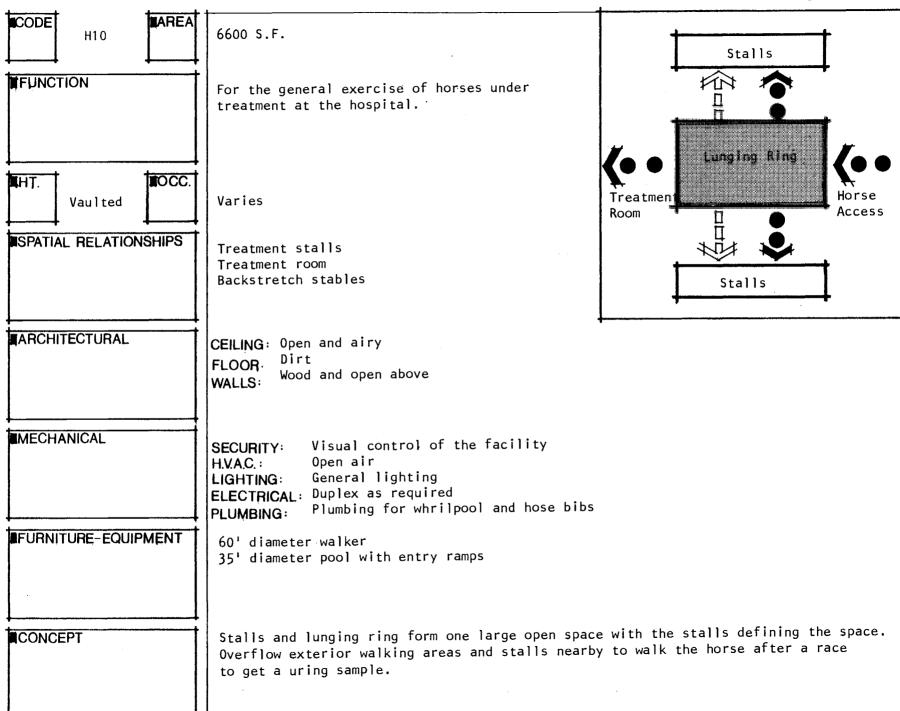
## Treatment Room

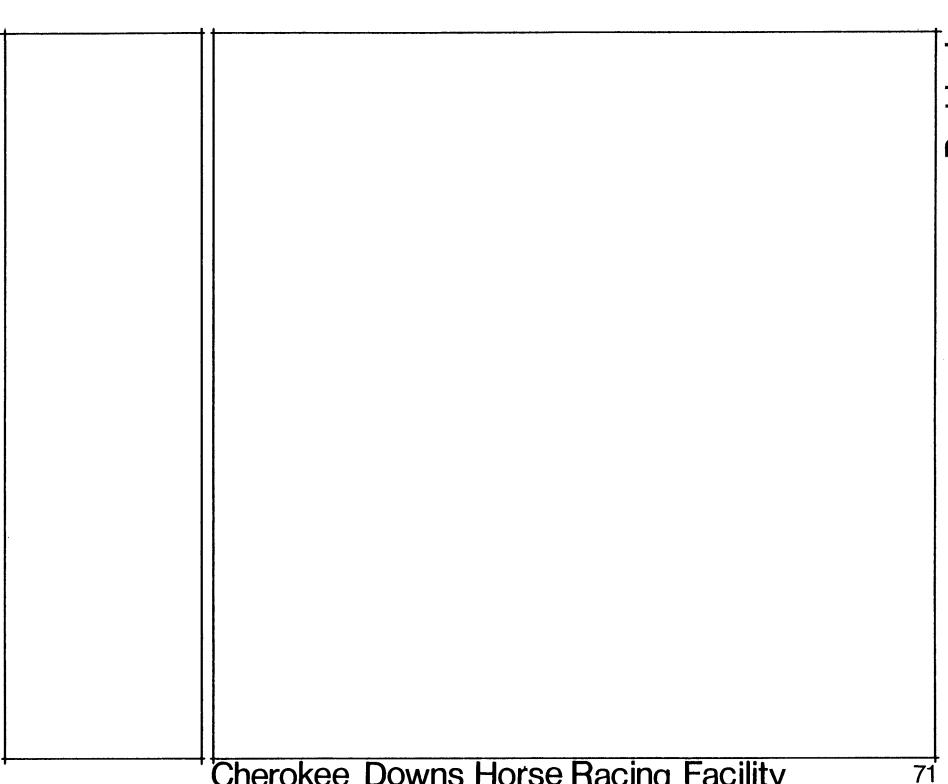


# Recovery Stalls

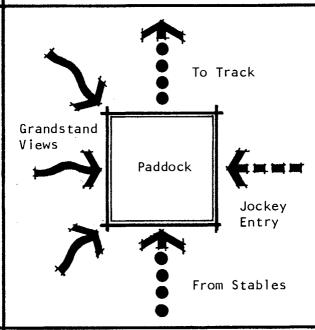


# Lunging Ring





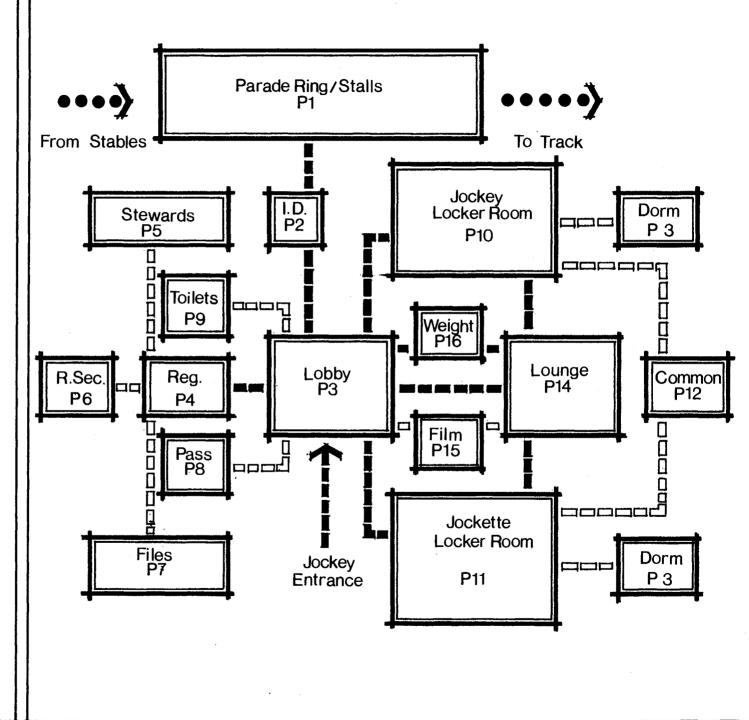
The Paddock is a very important part in the preparation for a race. All jckeys register at the Paddock House a couple of hours before the first race and must remain in the Paddock or Track area until after their last race. Therefore, the Paddock House includes facilities for jockey arrival and registration, intermediate facilities, and mental and phsyical preparation for a race. The exterior Paddock facilities include saddling stalls and a parade ring where the horses and jockeys are joined and viewed by the spectators at close range. The Paddock is to be viewed from the grandstand and shall be located such that the horses may be viewed conviently from all levels of the Grandstand. It is during this parading process that the greatest amount of money is wagered. Therefore, the Paddock should create an inviting atmosphere with large crowds and ample betting facilities in the viewing areas.



#### Space Requirements

P1	Parade Ring and Saddling Stalls		25728	S.F.
P2	Identification Area		240	S.F.
P3	Lobby		1500	S.F.
Р4	Registration		700	S.F.
P5	Stewards		240	S.F.
P6	Racing Secretary		240	S.F.
P7	Files		120	S.F.
P8	Passes		170	S.F.
P9	Public Toilets		200	S.F.
P10	Jockey Locker Room		1600	S.F.
P11	Jockette Locker Room		300	S.F.
P12	Common Areas- Laundry/Massage/Sauna		645	S.F.
P13	Dormitory		225	S.F.
P14	Jockey Lounge		-	S.F.
P15	Film Room		225	S.F.
P16	Weight Room		200	S.F.
			, <del></del>	
		Total	9370	S.F.

excluding ring

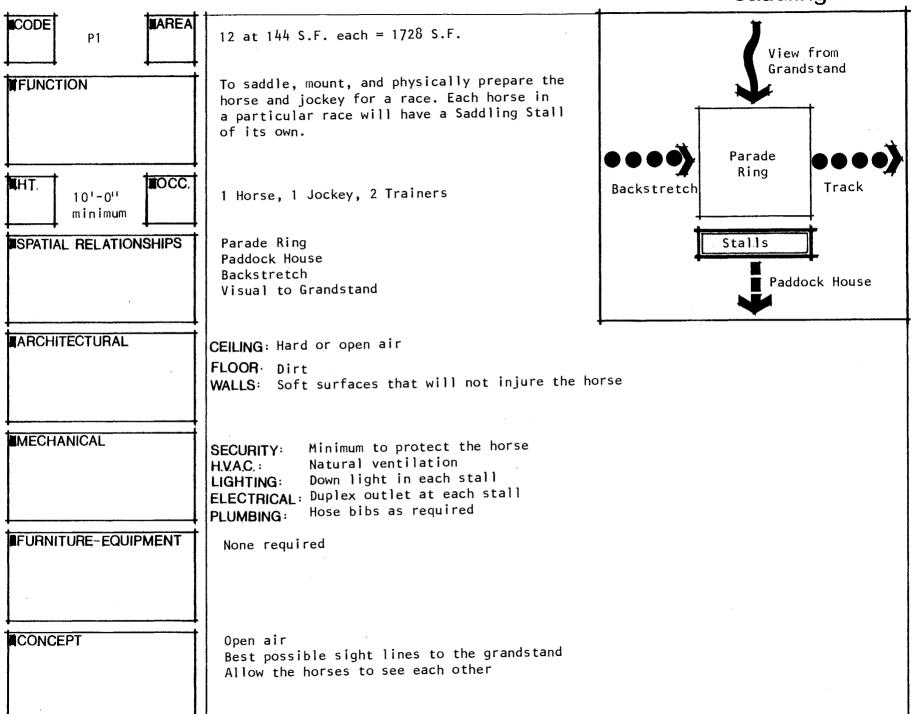


Cherokee Downs Horse Racing Facility

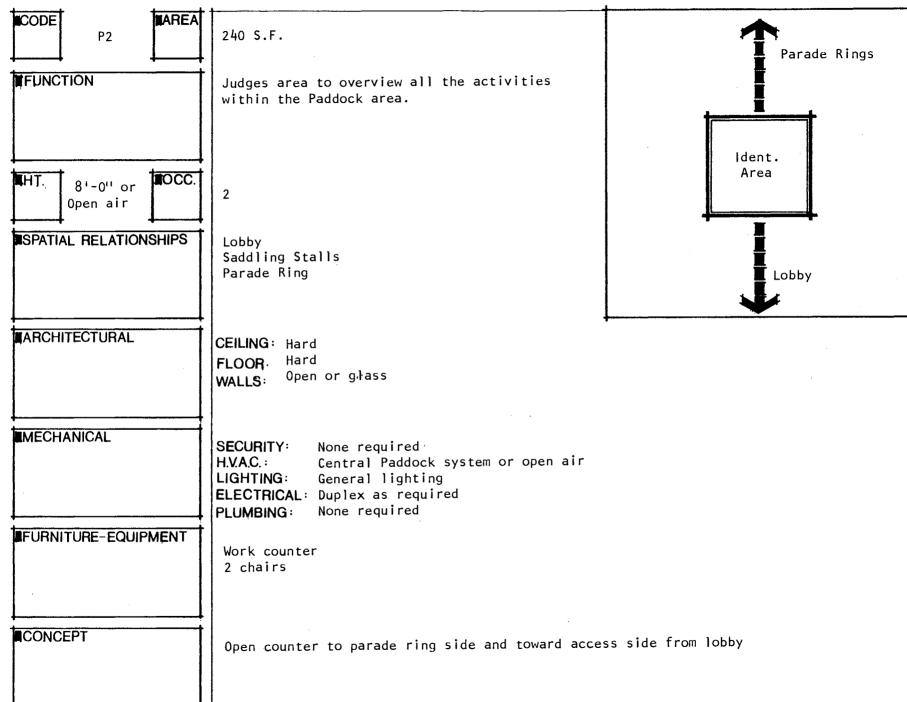
Parade Ring

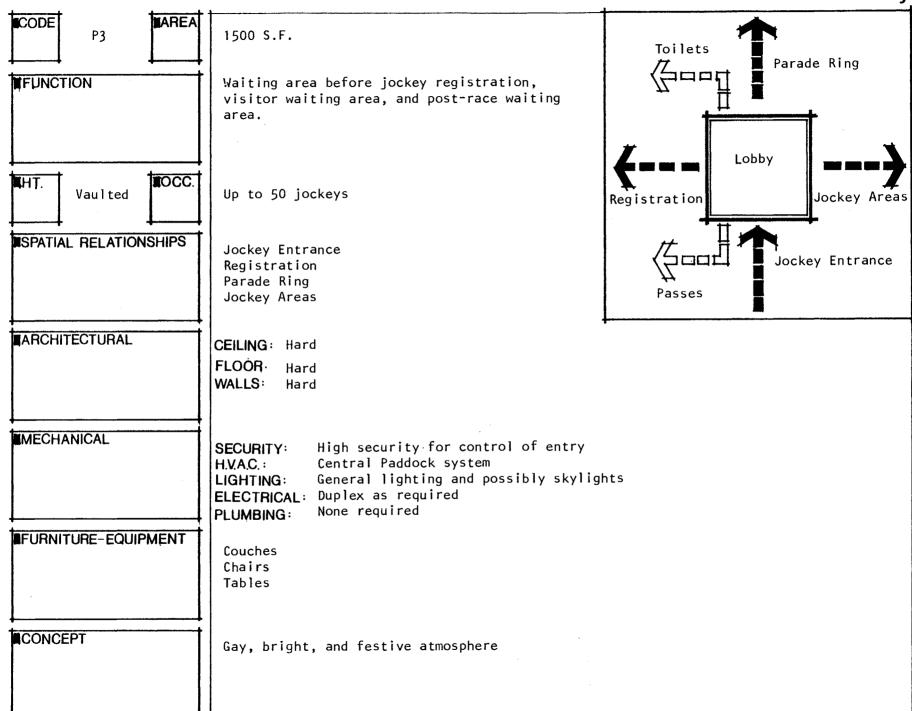
		raraue ning
MAREA P1	24000 S.F.	View from
MFUNCTION	The function of the Parade Ring is to show off the horses and the jockeys at close range to the spectators. The goal of this space is to be a showcase for the horses and jockeys.	Grandstand
MHT. Open	12 Horses, Jockeys, and Trainers	Backstretch Ring Track
SPATIAL RELATIONSHIPS	Backstretch Paddock House Saddling Stalls Grandstand Viewing	Saddling Ring Paddock House
<b>ARCHITECTURAL</b>	CEILING: Open FLOOR Dirt WALLS: Open	
MECHANICAL	SECURITY: Minimum for the protection of the ho H.V.A.C.: Open air LIGHTING: High intensity lights for night view ELECTRICAL: None PLUMBING: Sprinklers to keep the parade surface	ing
FURNITURE-EQUIPMENT	Camera Platform	
<b>ACONCEPT</b>	This is where the action is, the highest percent Paddock area show the area should be very eleganthe horses and jockeys.	age of money is wagered at the t and act as the showcase for

Saddling Stalls

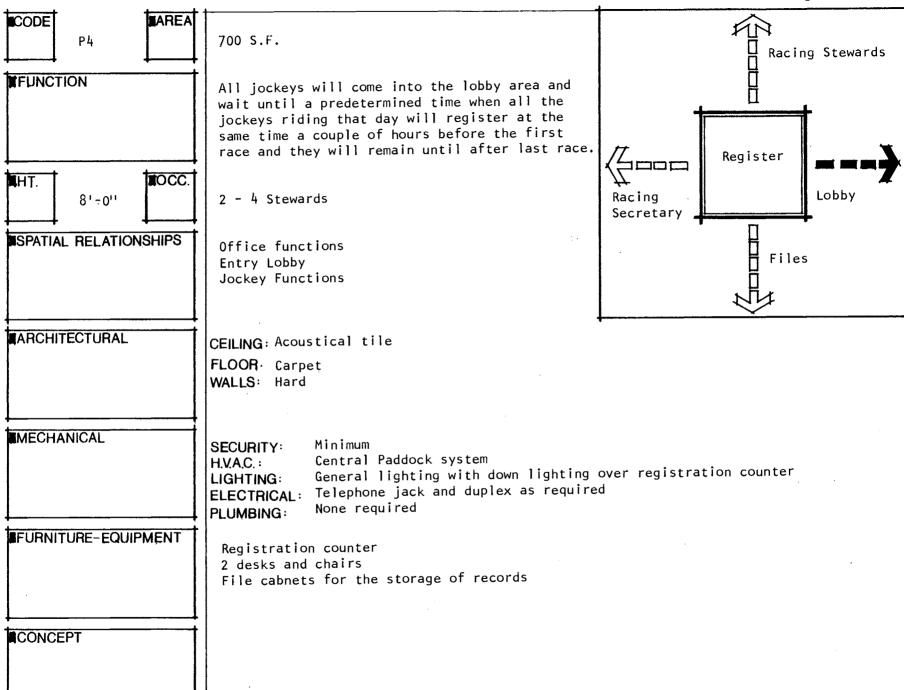


Identification

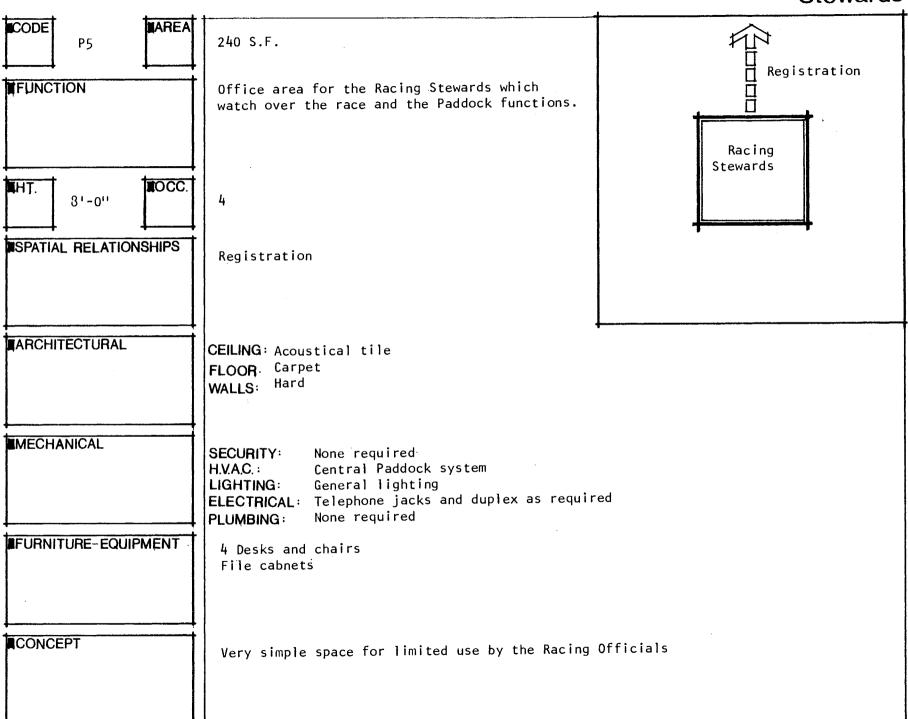


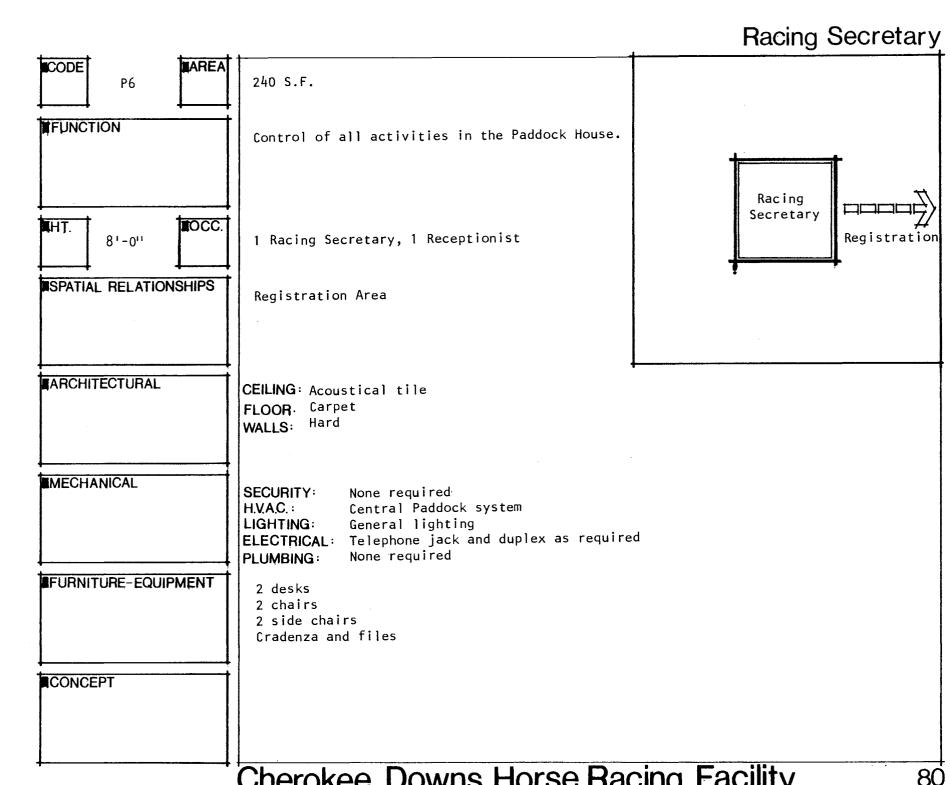


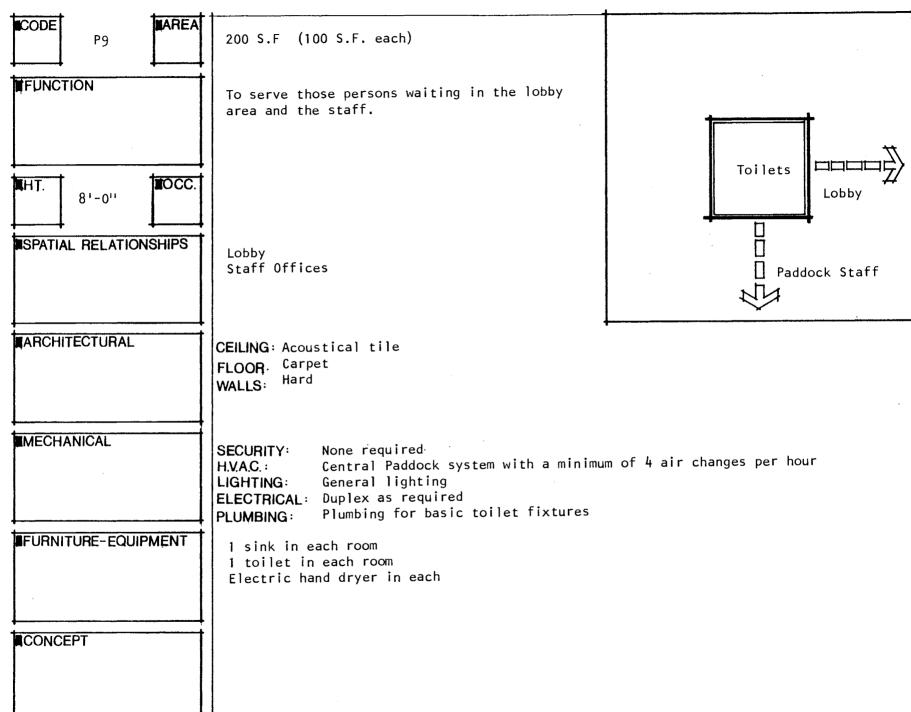
Registration



# Stewards

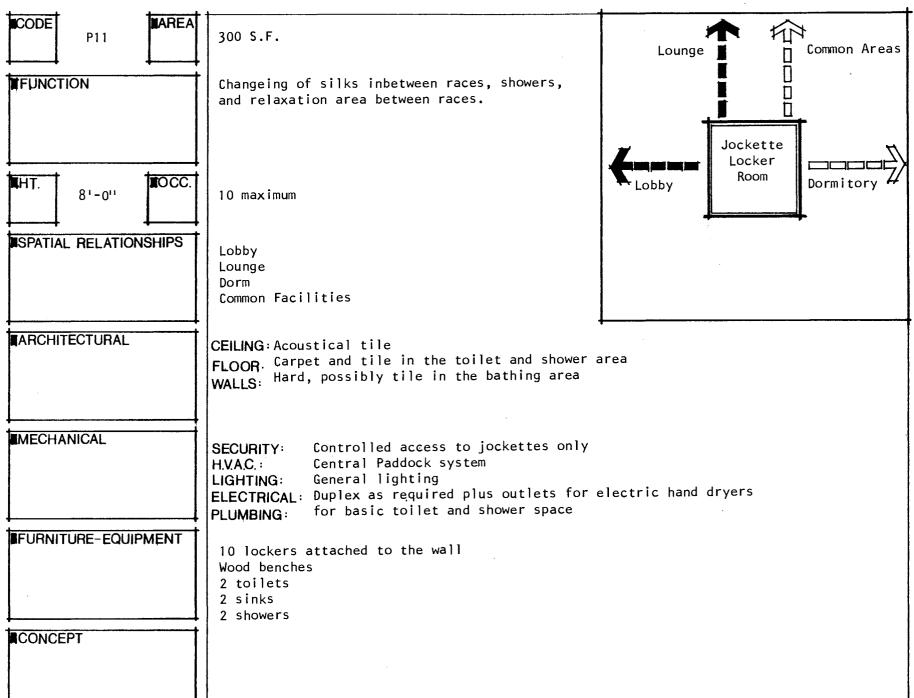




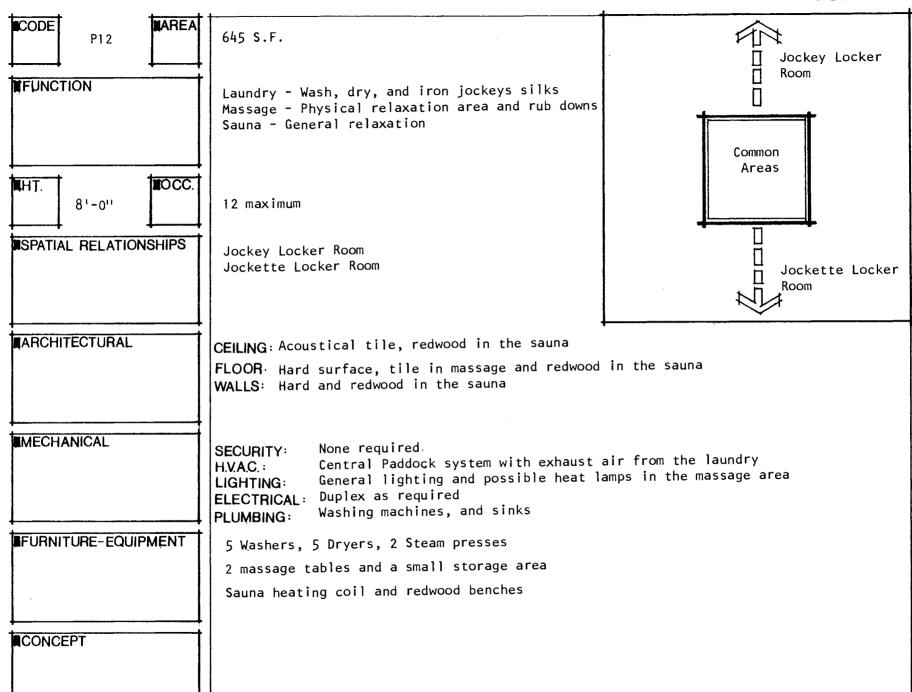


Jockey Locker Room CODE MAREA 1600 S.F. P10 **TFUNCTION** Changeing of silks inbetween races, showers, and relaxation area between races. Jockey Locker EOCC. Room MHT. Dormitory 5 8 1 Lobby 81-011 50 maximum INSPATIAL RELATIONSHIPS Lobby Dorm Common Areas Lounge Lour.je 💂 Common Facilities **ARCHITECTURAL CEILING**: Acoustical tile FLOOR. Carpet, tile in shower and toilet area WALLS: Hard, possible tile in bathing area **EMECHANICAL** Controlled access to jockeys only SECURITY: Central Paddock system H.V.A.C.: Gemeral lighting LIGHTING: ELECTRICAL: Duplex as required plus outlets for hand dryers for basic toilet facility and showers PLUMBING: #FURNITURE-EQUIPMENT 50 lockers attached to the wall Wood benches 6 Showers 2 toilets 2 urinals 3 sinks CONCEPT

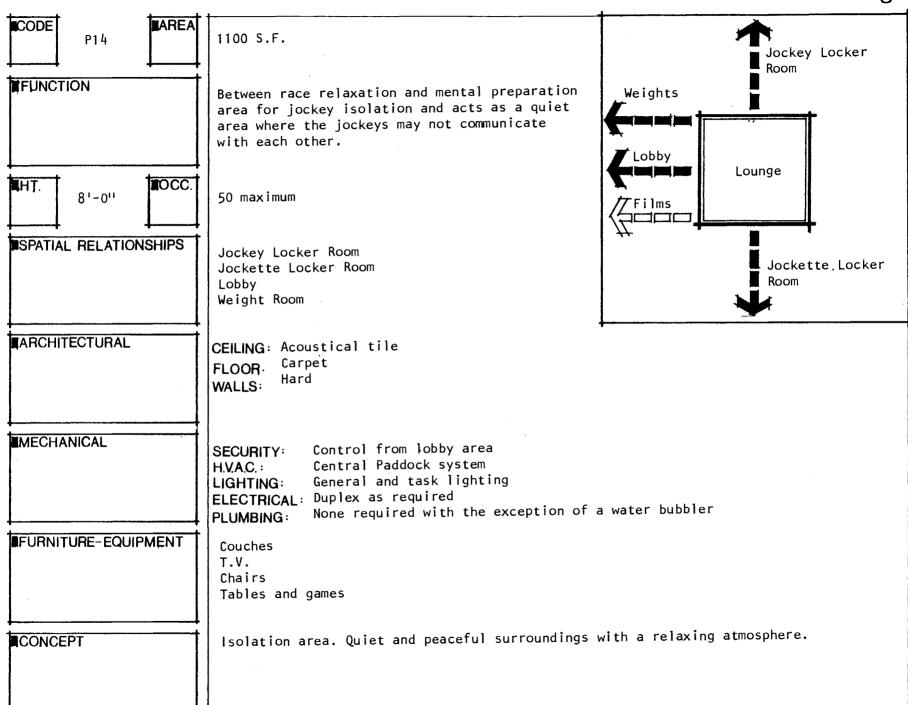
### Jockette Locker Room

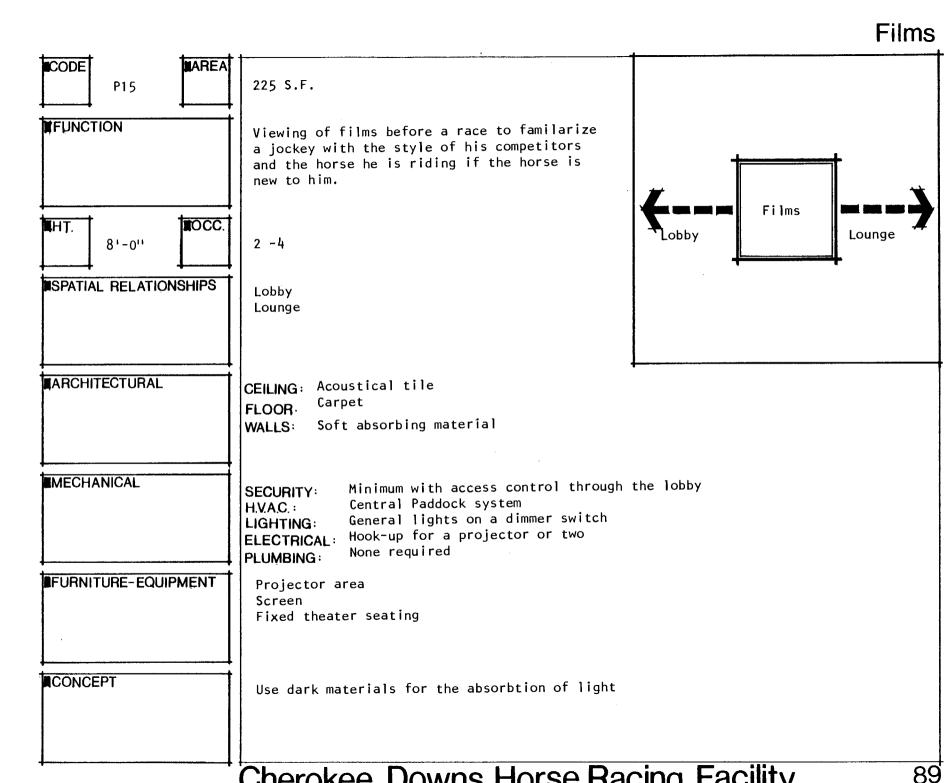


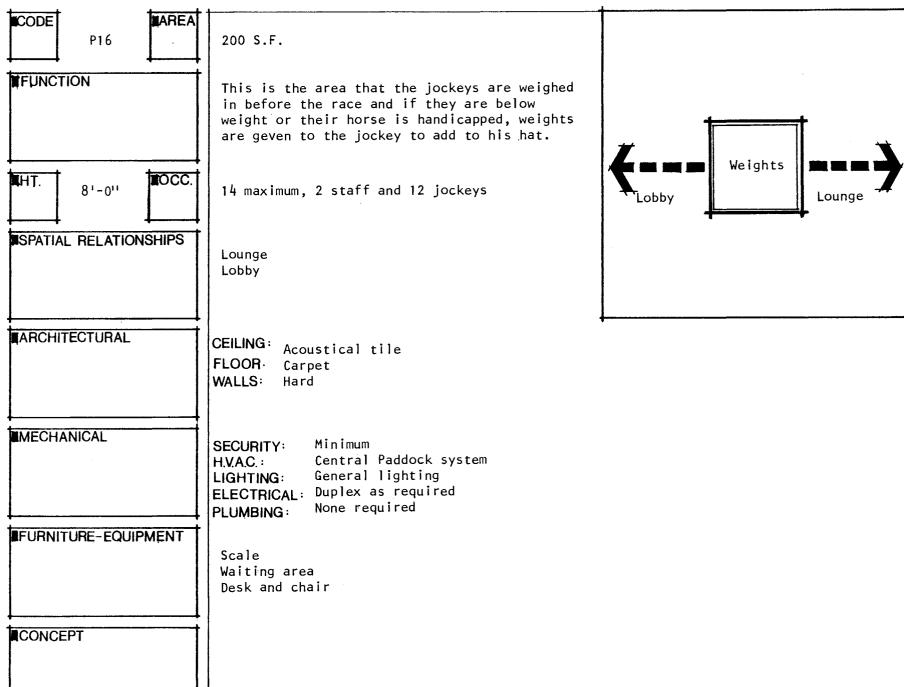
### Common

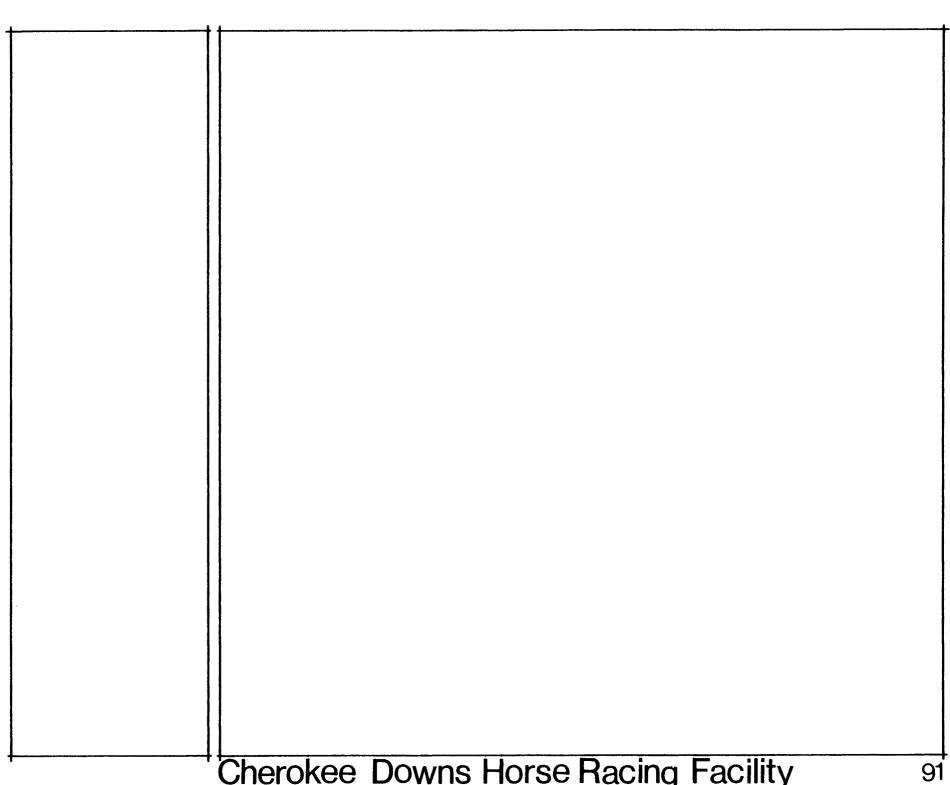


P13	225 S.F.	
FUNCTION	Place to lay down before the race to relax and sleep if the jockey is not racing for a few races. This area would be divided into 2 equal spaces for the jockeys and the jockets.	Dormitory
#HT. 8'-0"	4 in each sleeping area	Locker Rooms
SPATIAL RELATIONSHIPS	Jockey Locker Room Jockette Locker Room	,
<b>■</b> ARCHITECTURAL	CEILING: Acoustical tile FLOOR: Carpet WALLS:	
MECHANICAL	SECURITY: Minimum security with control through H.V.A.C.: Central Paddock system LIGHTING: General lighting ELECTRICAL: Duplex as required PLUMBING: None required	n the locker rooms
FURNITURE-EQUIPMENT	4 beds in either a bunk arrangement of in a berth	h type arrangement
<b>ACONCEPT</b>		









In contemporary racing facilities, the primary objective of the Grandstand is to provide a clear and unobstructed view of the race track and related functions while keeping the space temperature controlled and keeping the sun and glare from the front of the facility. This brings about the importance of the site orientation to the facility. To allow these unobstructed views, large expanses of glass will be incorporated. This brings to light the key issues of maintenence cost, accedent prevention, and energy efficiency in the design of the Grandstand super structure.

Fenestration must also be considered to open up the facilities interior as well as to provide the users with directed views to the site from the public areas. The fenestration should also be designed to allow natural ventilation whenever possible, since the majority of the race meets will be in the evenings and at night. This ventilation should naturally cool the major public spaces when the weather permits and also allow the facility to be flushed out at night to reduce energy costs. Also, whenever possible, natural lighting and ventilation should be incorporated in the form of skylights, windows, and atriums.

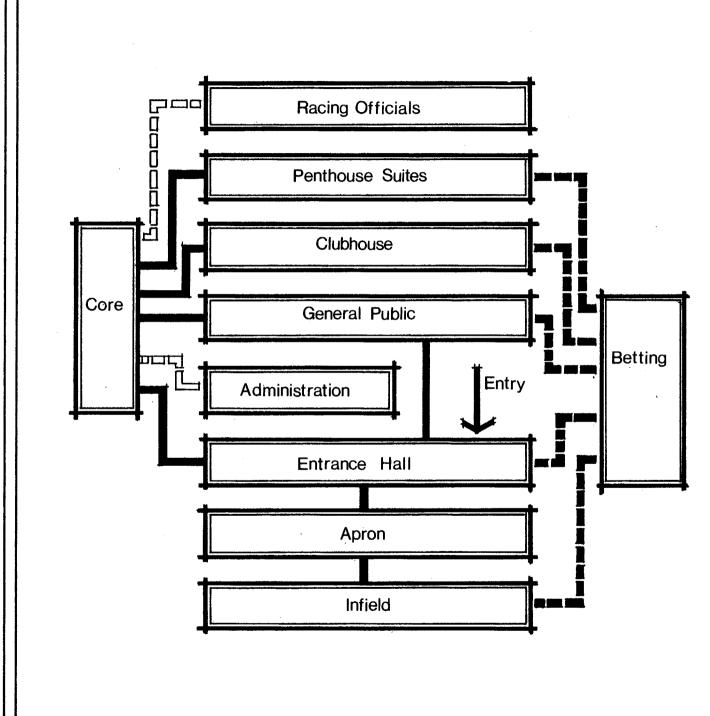
The Grandstand is the primary public facility in the complex, and should have a strong visual image from Highway 51 and from Keystone Lake. Upor leaving their cars, the public is brought through the turnstiles into the Entrance Hall. Once inside the Entrance Hall, the public is provided with all concessions, bars, betting windows, and circulation core to all facilities within the Grandstand. The race goers can then disperse to their seating areas or go to other areas in the Grandstand for the viewing of races and activities in the Paddock area, or just experience crowd interaction. Also located within the Grand stand is the Administrative Offices, Support Facilities, Racing Officials, and the brain center for the Para-mutuels. The Grandstand should be a strong visual structure portraying the nature of the sport and the proper image.

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n - n	<u>_</u>	Track / Infiek	<del>,</del>		Track Maintenen Equipmer		
gh		Apron					
d		Grandstand	I	<b> </b> -	Paddock		
d-	Preferred Parking		Valet Parking		Backst	retch	Ī
<u> </u>		<u>↓</u> ↓				<b></b>	·
	General Admission Parking		Bus Parking		Hors Pari	emen's king	
	Main G	ate	Se	rvice		Horseme Gate	₹s
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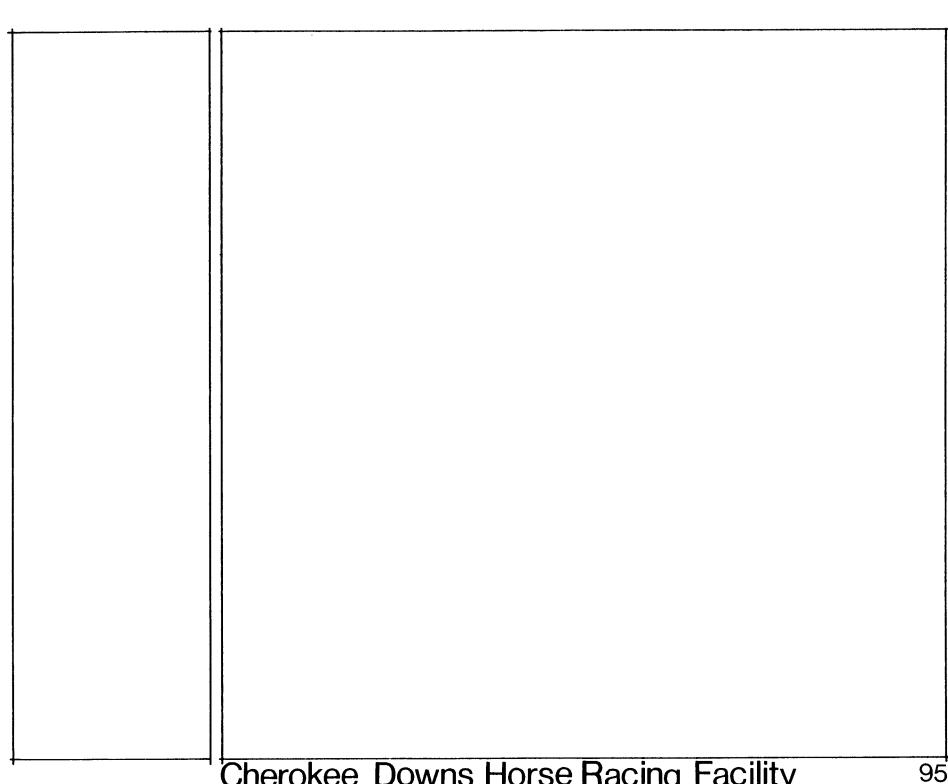
#### Space Requirements

Entrance Hall		93000 S.F.
General Public		99200 S.F.
Clubhouse		130775 S.F.
Penthouse Suites		47300 S.F.
Administration		6215 S.F.
Support Facilities		4620 S.F.
Para-mutuel Betting		6720 S.F.
Racing Officials		3000 S.F.
	Total	390830 S.F.

94

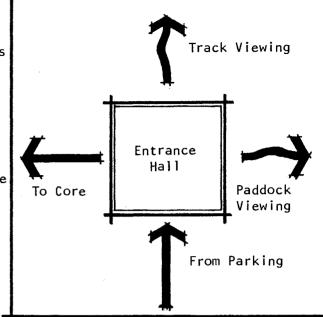


Cherokee Downs Horse Racing Facility



### **Entrance Hall**

The Entrance Hall serves all patrons as an orientation and dispersion area to all the facilities within the Grandstand. The excitment begins to build as the race goer passes the turnstiles and enters the Grand Hall. The crowd grows, chance meetings occur, sounds intensify, smells blossom, and there is action and excitement in the air. Within the Entrance Hall, people are provided with food services, access to the central circulation core, and t.v. monitors bringing the action of the Paddock and Track up close. The race goer is now ready to experience and participate in the ultimate racing experience, a race meet at Cherokee Downs.

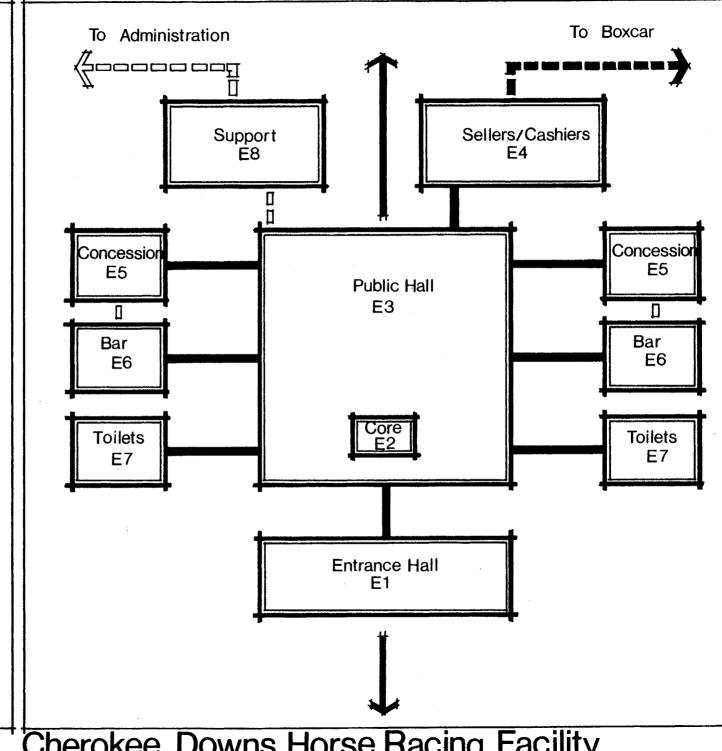


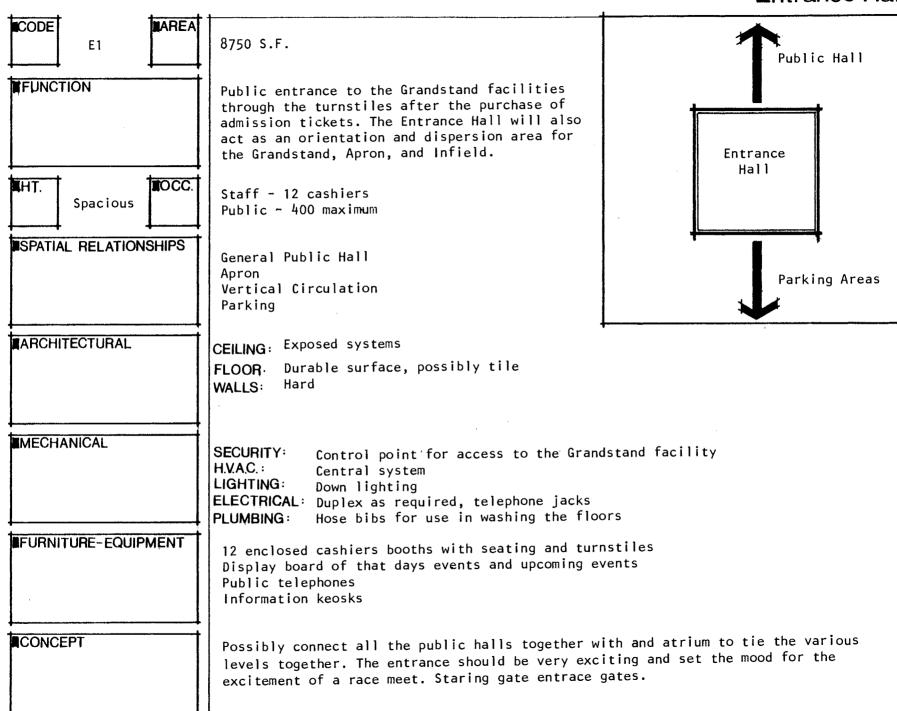
#### Space Requirements

E1	Entance Hall		8750	S.F.	
E2	Circulation Core		4500	S.F.	per
E3	Public Grand Hall		49500	S.F.	
E4	Public Hall Sellers and Cashiers		4500	S.F.	
E5	Concessions		4000	S.F.	
E6	Public Hall Bars		2000	S.F.	
E7	Public Toilets		4500	S.F.	
E8	Support Facilities		15350	S.F.	
		Total	93000	S.F.	

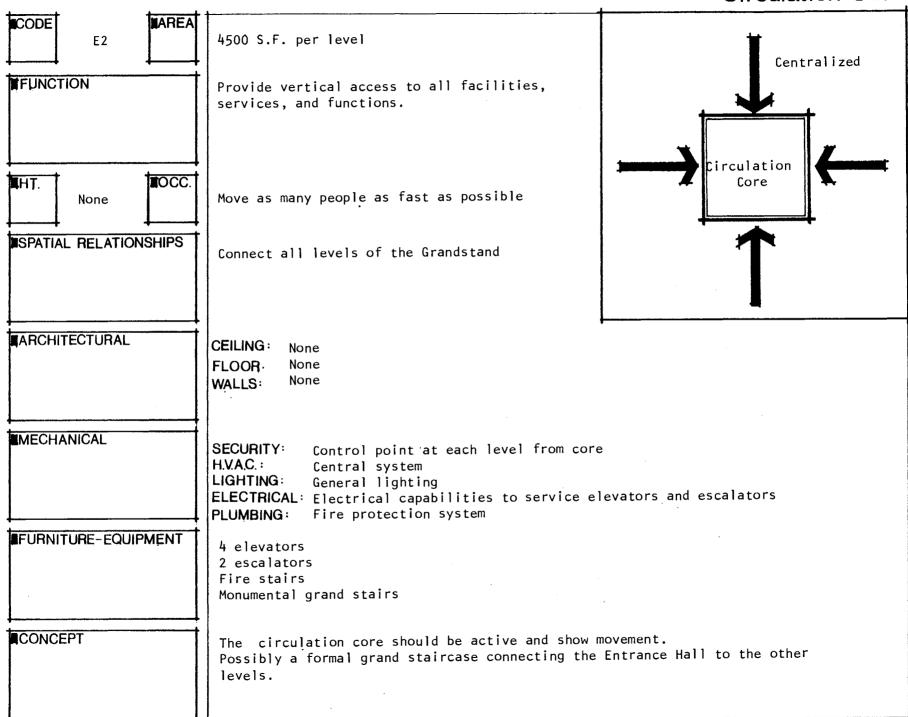
# Cherokee Downs Horse Racing Facility

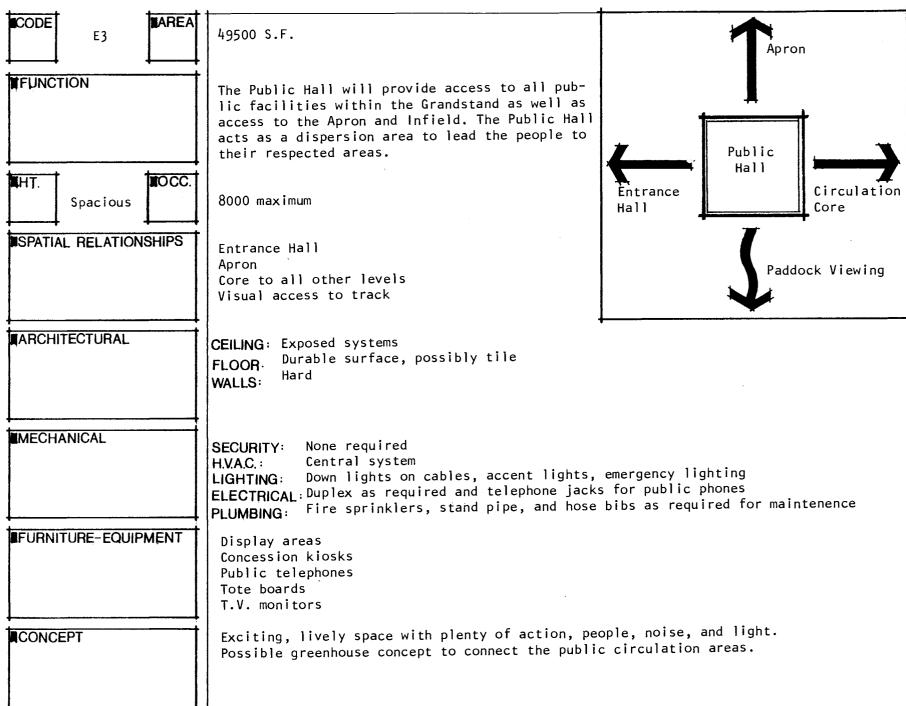
floor





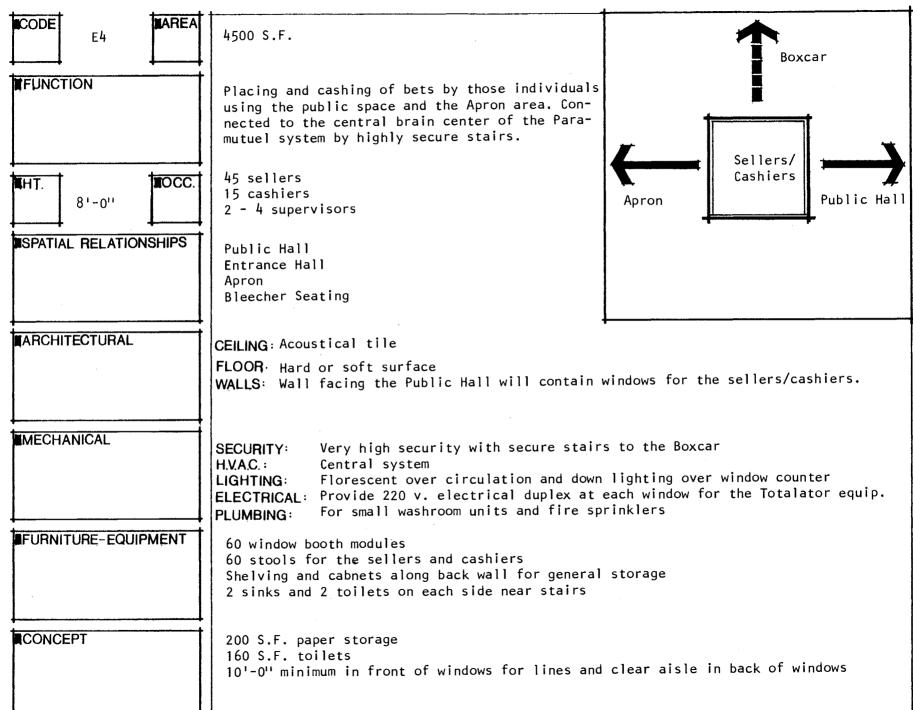
# Circulation Core





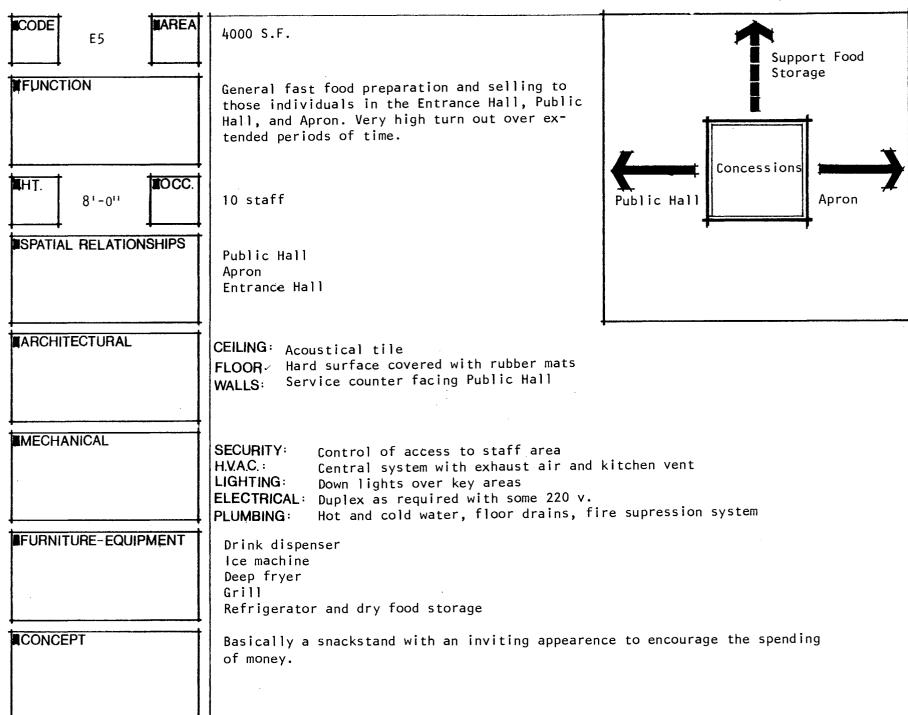
### Sellers/Cashiers

101



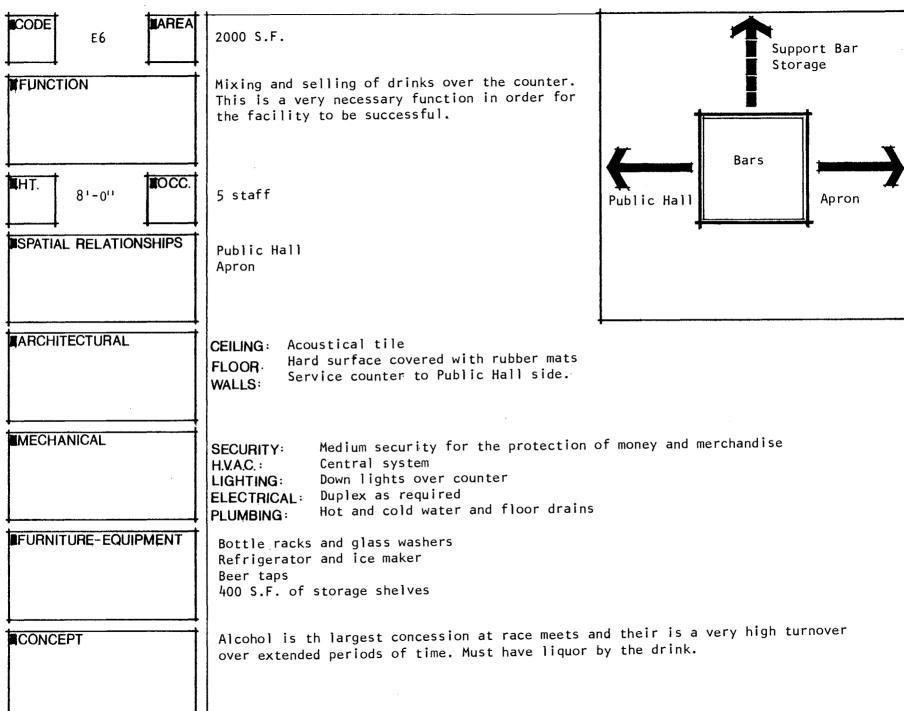
Cherokee Downs Horse Racing Facility

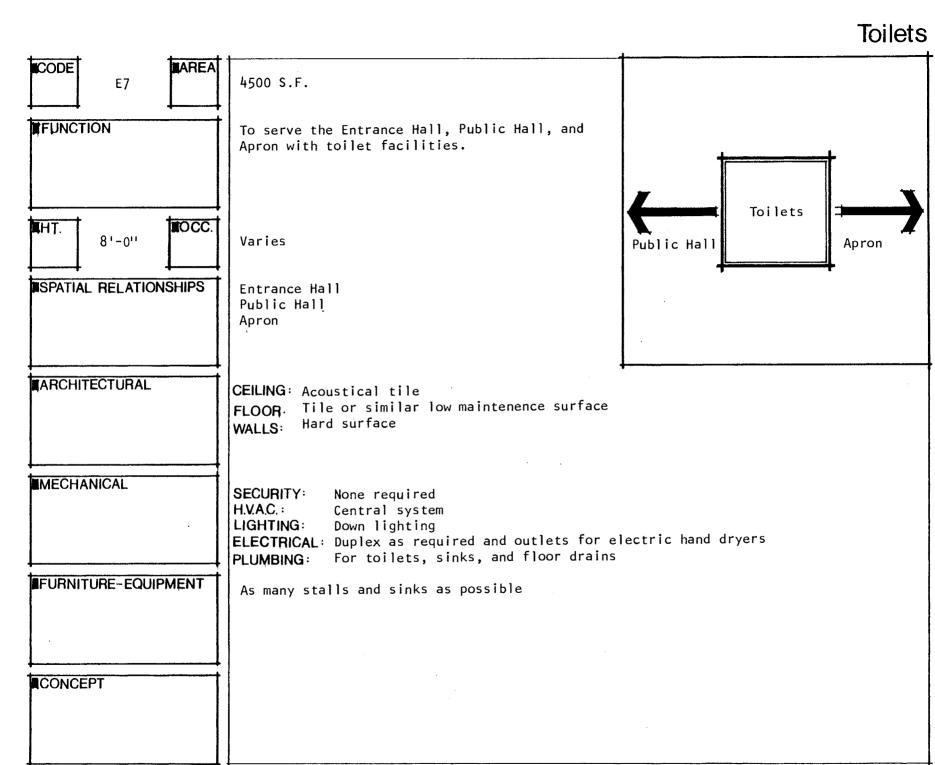
### Concessions

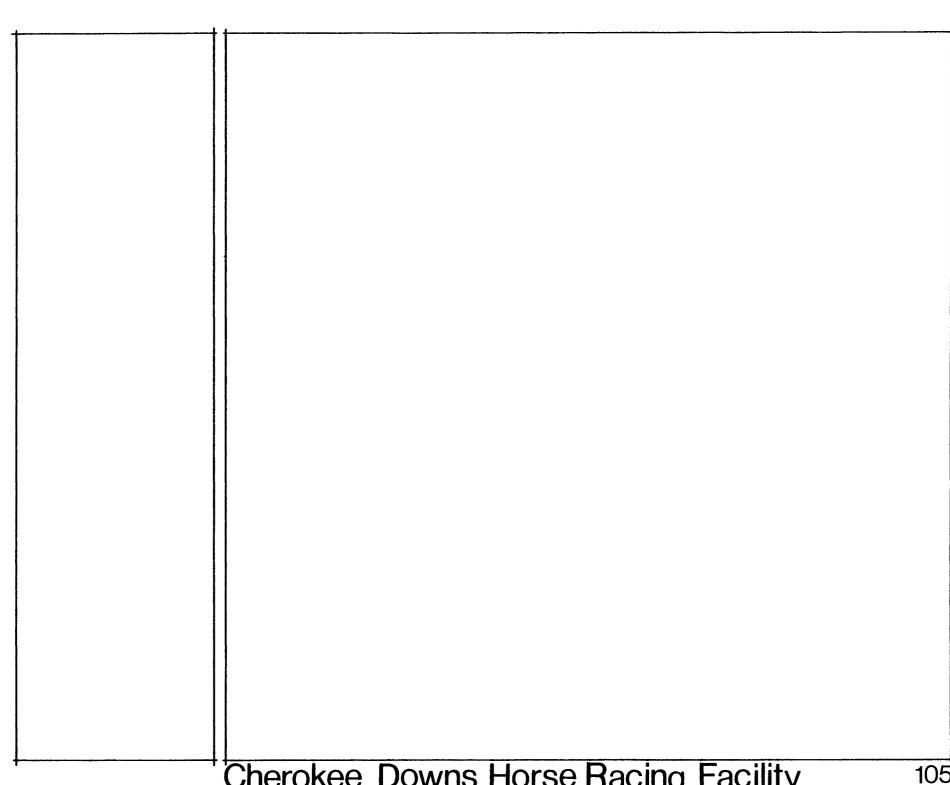


Cherokee Downs Horse Racing Facility

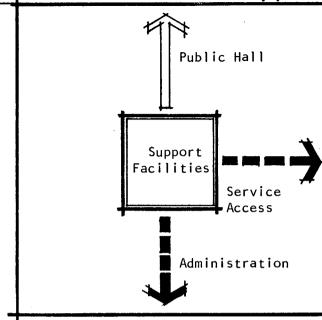
Bars





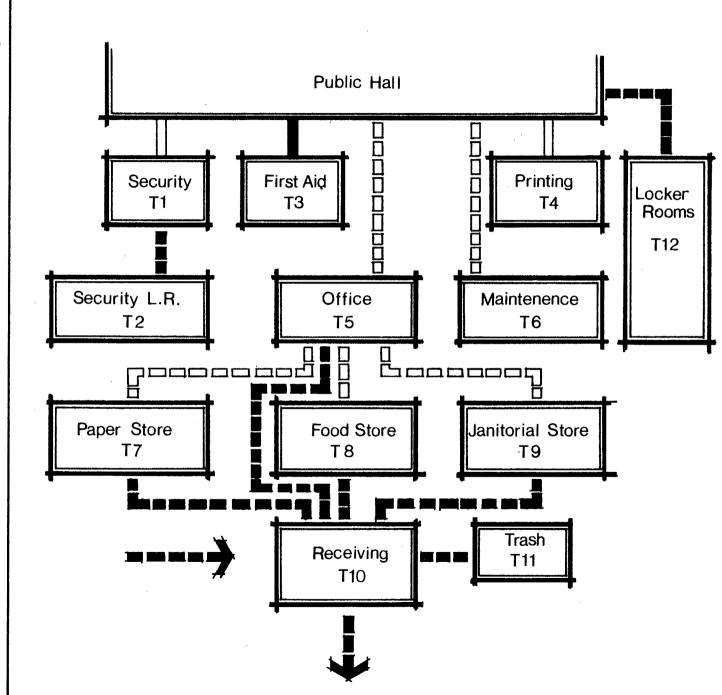


The support facilities are almost totally staff related functions with the exception of the First Aid Office and the Security Office. The support facilities should be located on the grade level for delivery access while the public functions should open on to the Public Hall. The Security Office not only serves the public, but is also the entry point for the entire Para-mutuel system and the Administration level. Beyond these public service areas, the support facilities control all incoming goods and personnel, the long term storage of these goods, and all outgoing products and personnel. One other function is the facility Printing Department for the publication of all track written material. Therefore, the support facilities are a key to the administration and operations of the entire facility. The Support area -hould be connected to all levels by a service elevator.



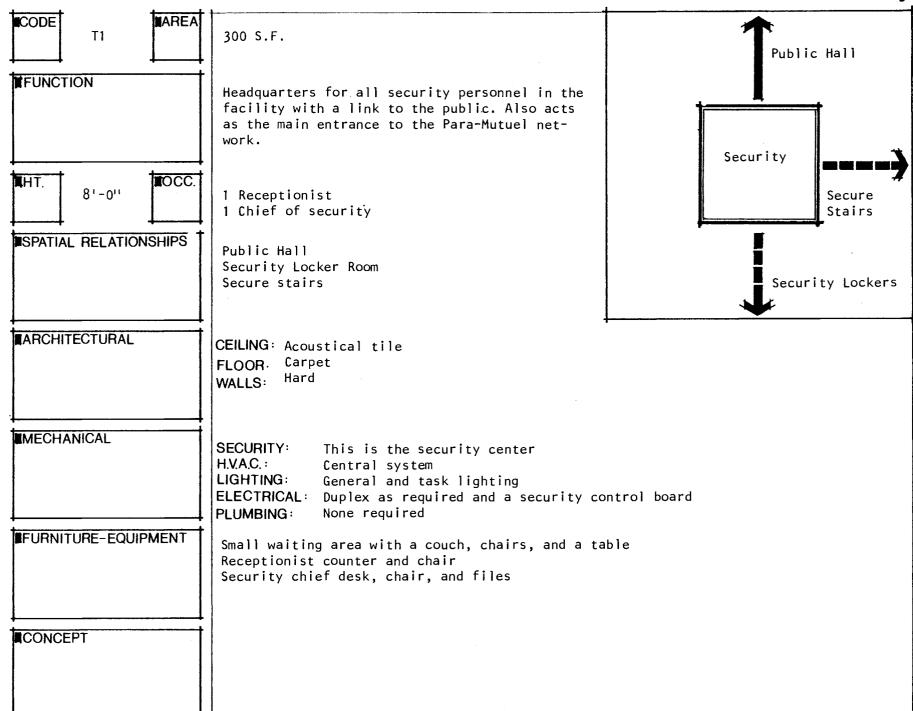
#### Space Requirements

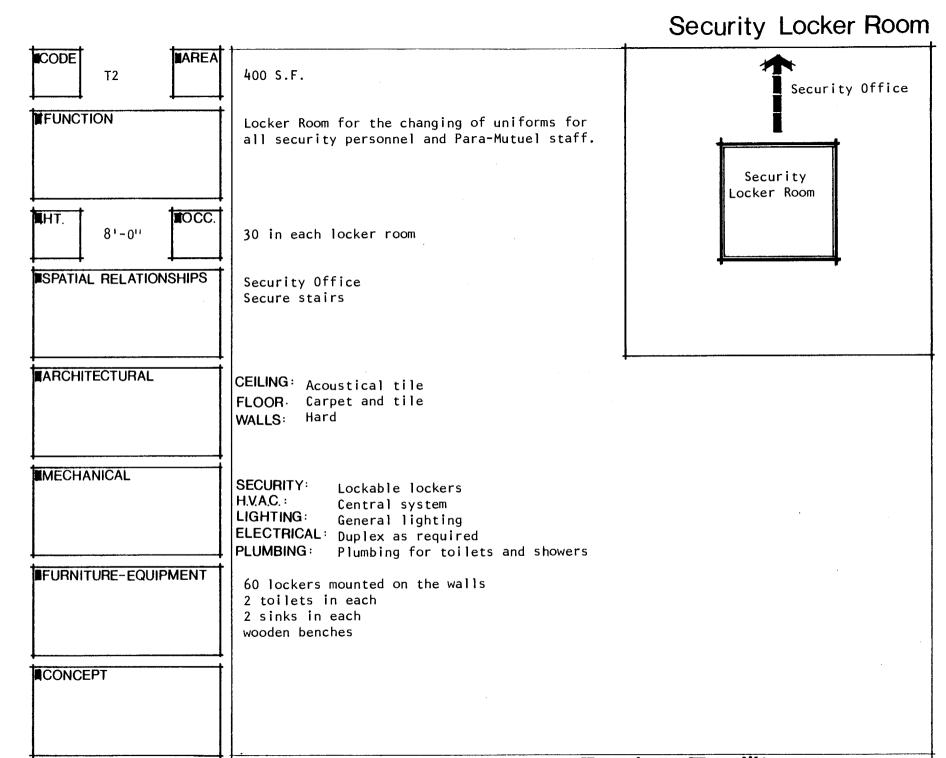
T1	Security Office	300 S.F.
Т2	Security Personnel and Para-mutuel Staff Locker Room	400 S.F.
Т3	First Aid Office	250 S.F.
Т4	Printing Department	600 S.F.
T5	Supply Offices	200 S.F.
т6	Central Maintenence Office	150 S.F.
Т7	Office Supply Storage	200 S.F.
т8	Food Supply Storage	400 S.F.
Т9	Janitorial Supplies	200 S.F.
T10	Receiving Area and Dock	400 S.F.
T11 .	Trash Pick-up Area	200 S.F.
T12	Staff Locker Rooms	1320 S.F.
! 	Total	4620 S.F.

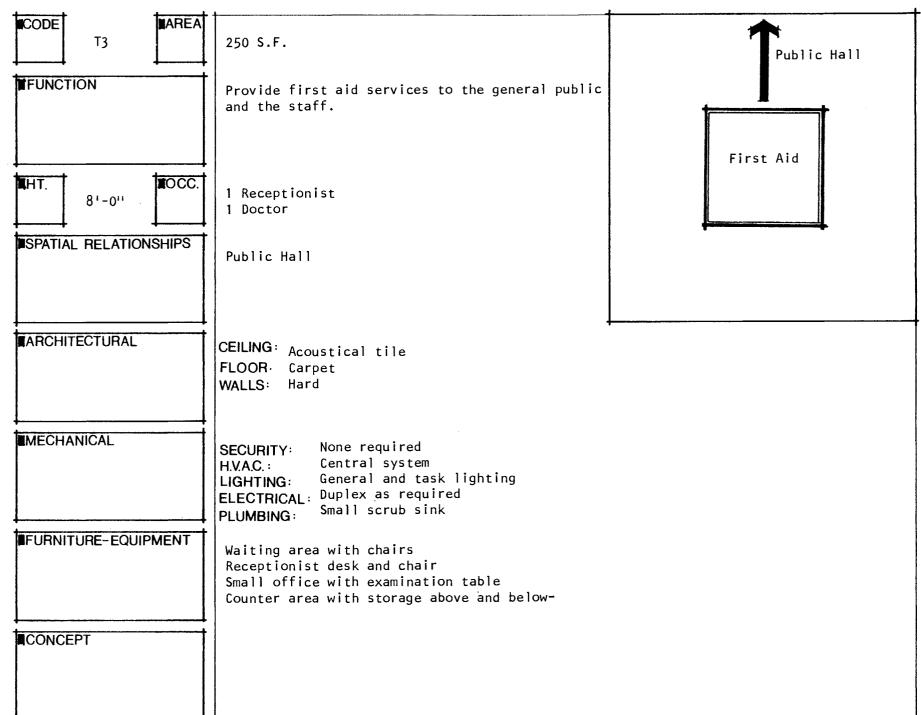


Cherokee Downs Horse Racing Facility

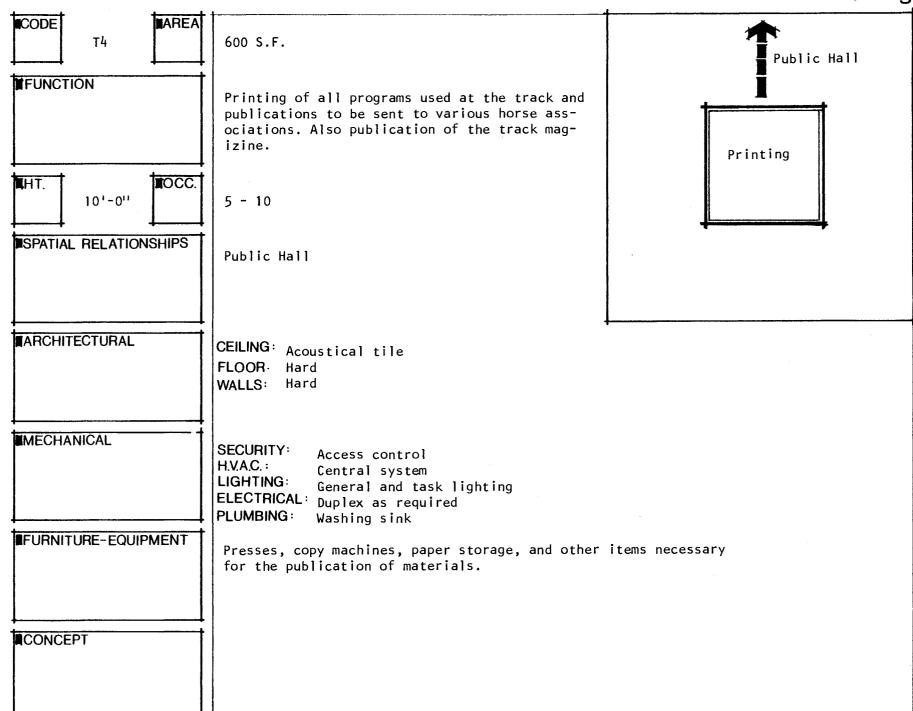
107



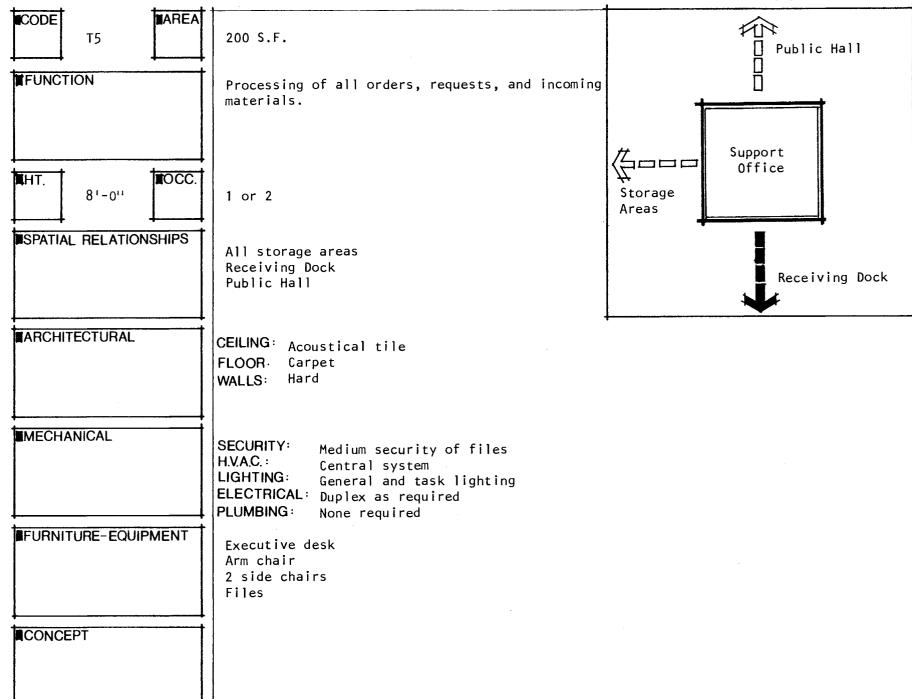




111

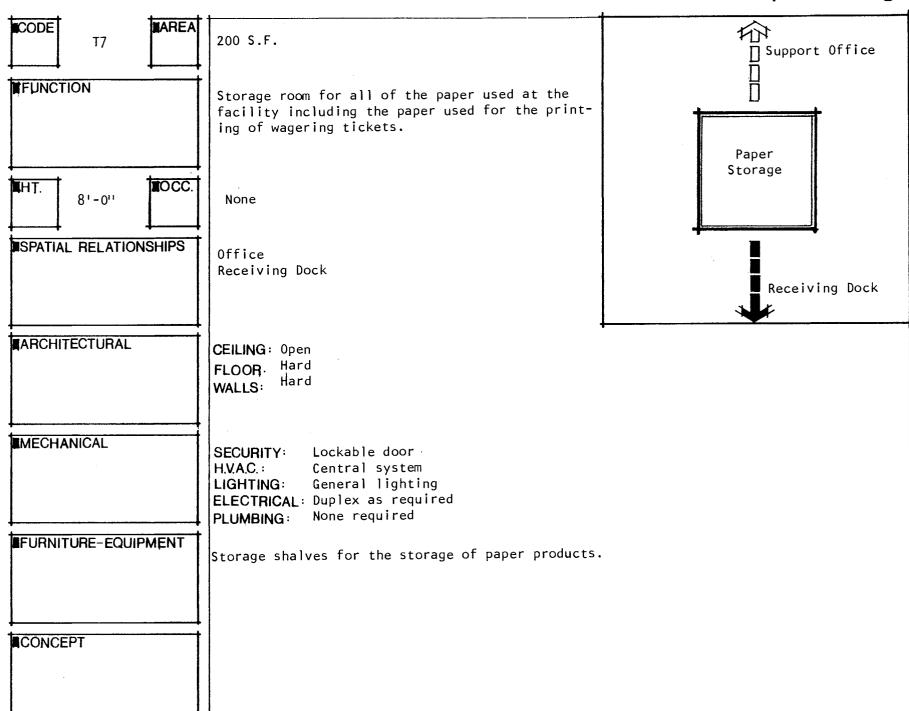


Support Office



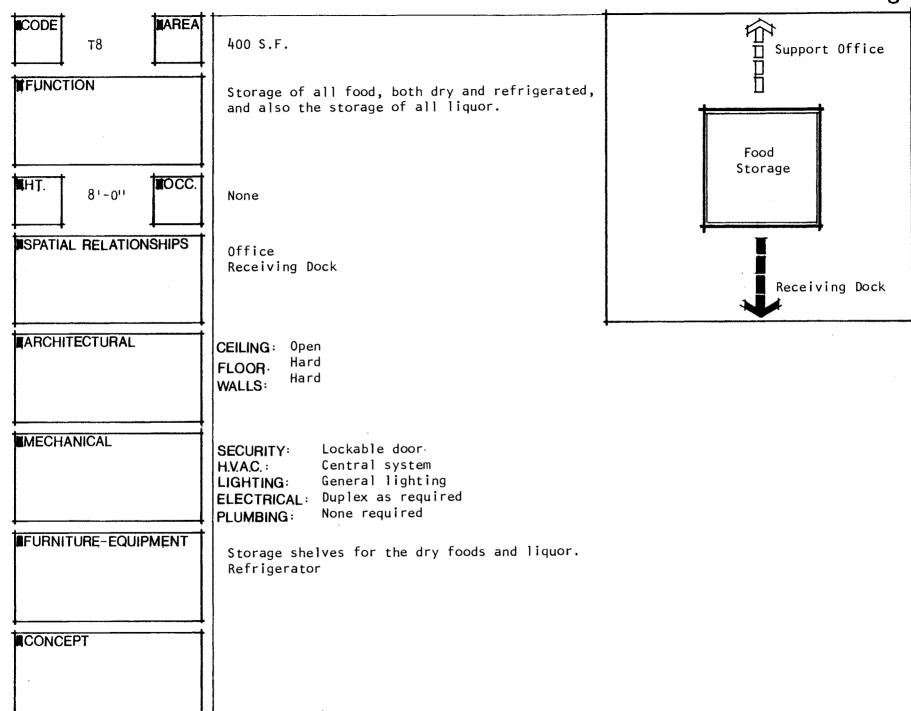
Maintenence Office CODE MAREA T6 150 S.F. ∏ Public Hall FUNCTION Office of the head maintenence engineer who oversees all of the maintenence of the facility Maintenence Office TOCC. HT. 81-011 SPATIAL RELATIONSHIPS Public Hall **EARCHITECTURAL** CEILING: Acoustical tile Carpet FLOOR. WALLS: Hard **IMECHANICAL** SECURITY: None required H.V.A.C.: Central system LIGHTING: General lighting ELECTRICAL: Duplex as required PLUMBING: None required #FURNITURE-EQUIPMENT Desk and chair Files Chalkboard **CONCEPT** 

# Paper Storage

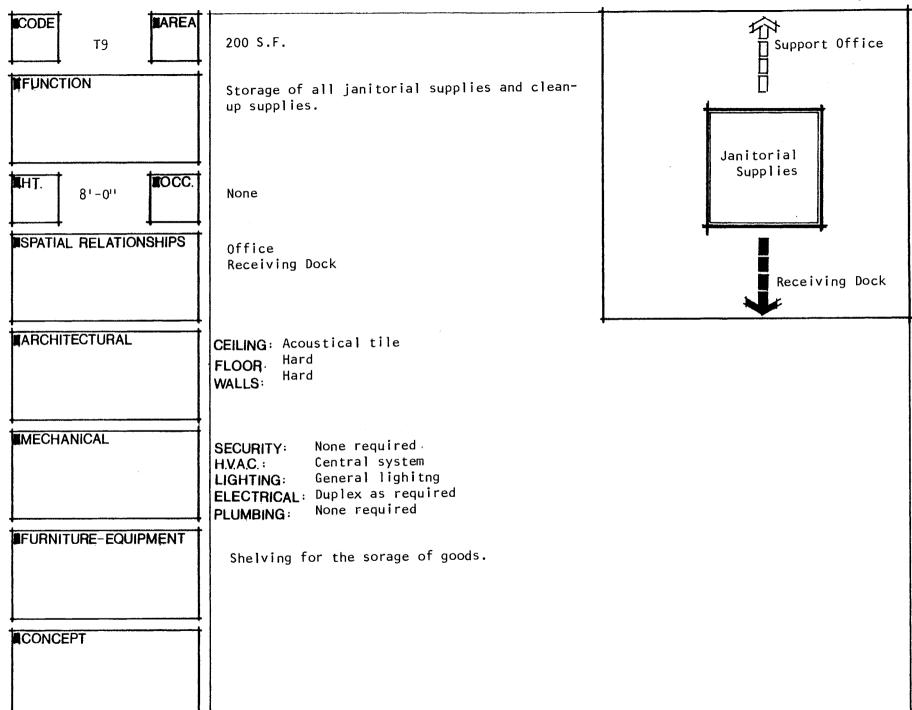


Cherokee Downs Horse Racing Facility

# Food Storage

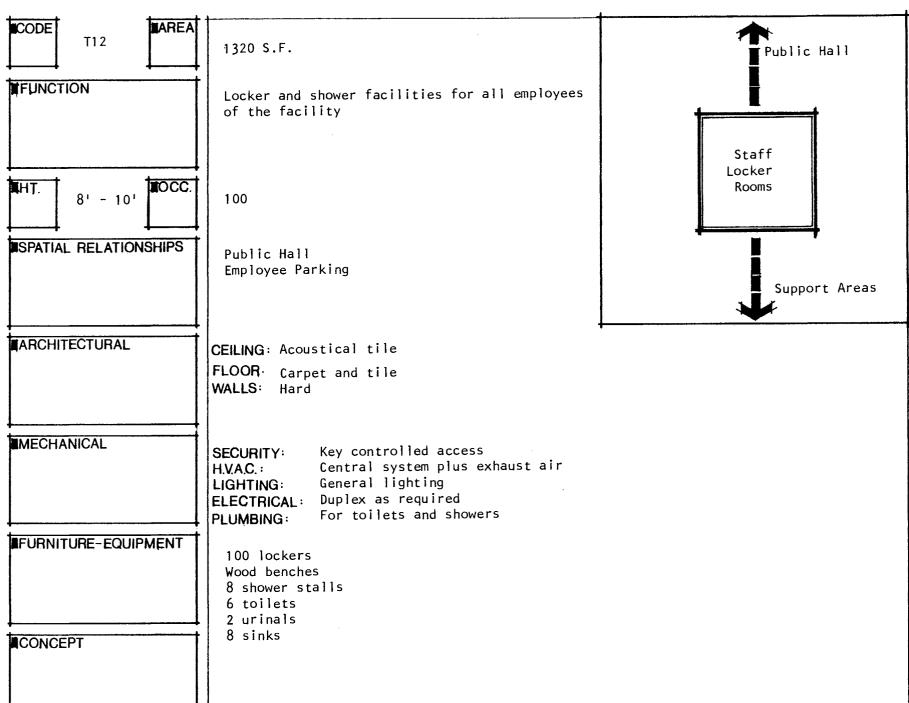


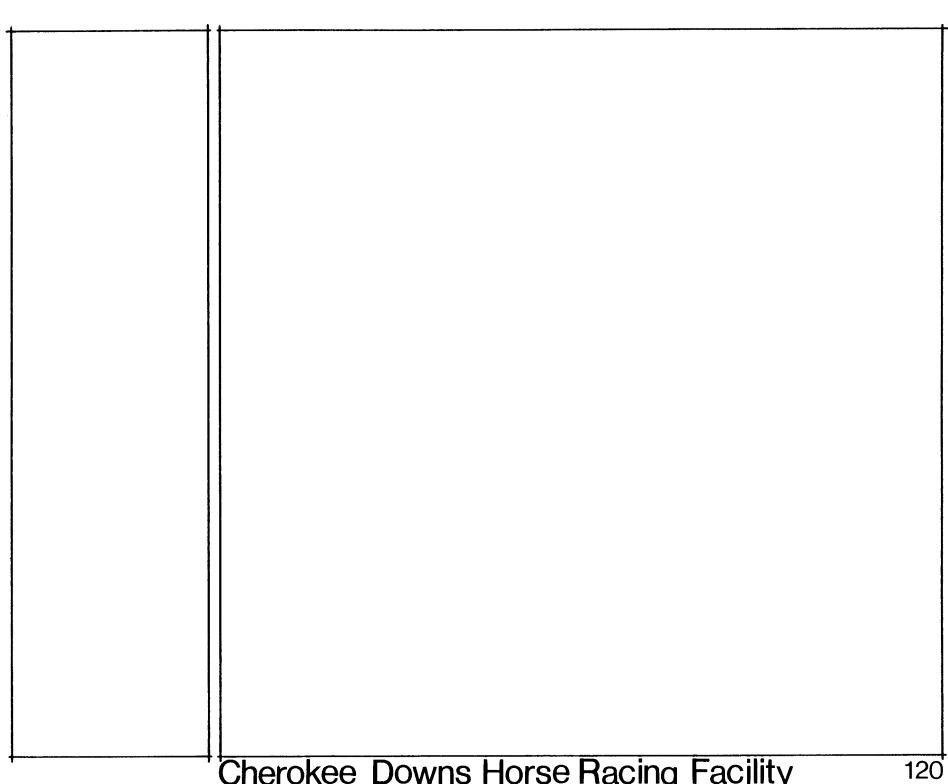
# Janitorial Supplies



Receiving Dock MAREA CODE 400 S.F. T10 Storage Areas Support Office FUNCTION Receiving of all goods coming into the Grandstand. Receiving Dock MOCC. Trash MHT. 121-011 None ISPATIAL RELATIONSHIPS All storage areas Offices Deliveries Trash area **ARCHITECTURAL** CEILING: Exposed Hard FLOOR-Hard WALLS: **EMECHANICAL** None required SECURITY: Central system H.V.A.C.: LIGHTING: General lighting ELECTRICAL: Duplex as required None required PLUMBING: **A**FURNITURE-EQUIPMENT CONCEPT

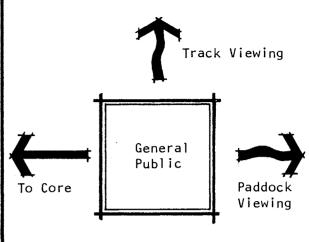
## Staff Locker Room





# General Public

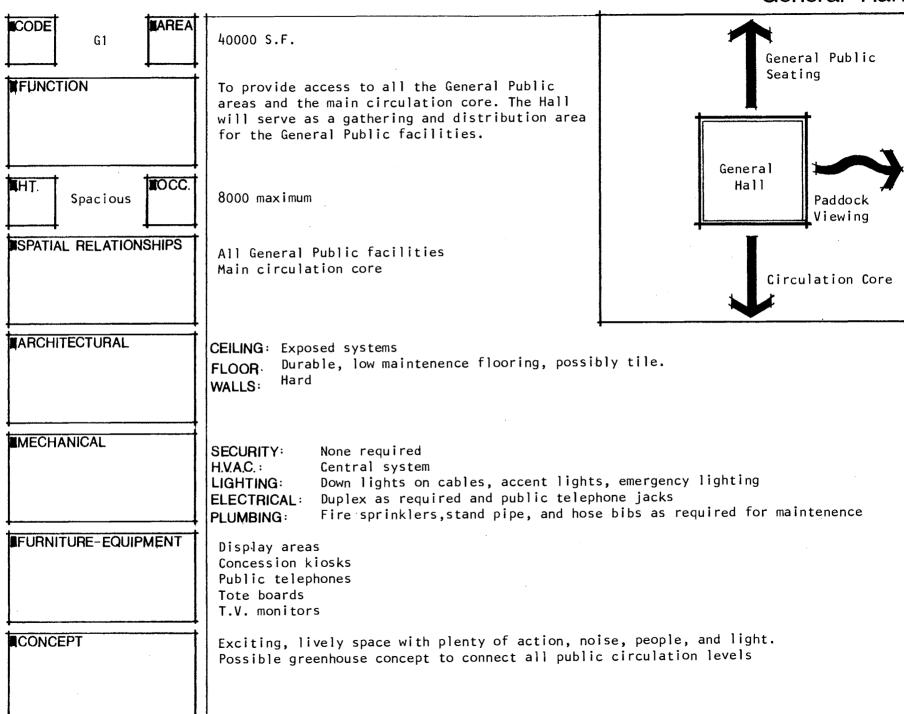
The General Public level or area is open to all patrons and contains the Reserved Seating areas. This area will seat the bulk of the spectators and should functionally and emotionally return the spectator to a bygone era in horse racing while providing the comforts of today. This bygone era was a period of active crowd envolvement large crowds, fancy dress, interaction, money, noise, and the spirit, created by many individuals cheering with, and against each other. The seating arrangement is in rows of stepped individual stadium seats sloping from the Apron bleechers to the General Public Hall which contains all the amenities for the general public use. The General Public Hall should be an exciting space with possible direct visual, audio, and physical link to both the Entrance Hall and the Clubhouse Hall so that all of the circulation areas are directly related (possible greenhouse concept).



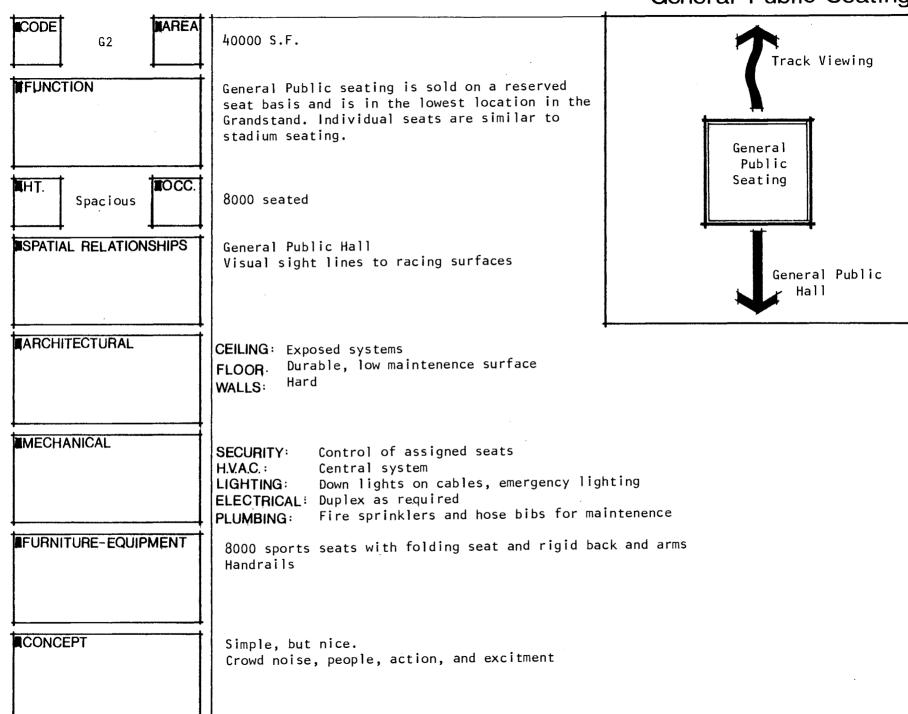
#### Space Requirements

		Total	94950	S.F.
G7	Public Toilets		3000	S.F.
G6	General Public Bars		1200	S.F.
G5	Concessions		4000	S.F.
G4	General Public Sellers and Cashiers		4500	S.F.
G3	Public Lounge		2250	S.F.
G2	General Public Seating		40000	S.F.
G1	General Public Hall		40000	S.F.

### General Hall

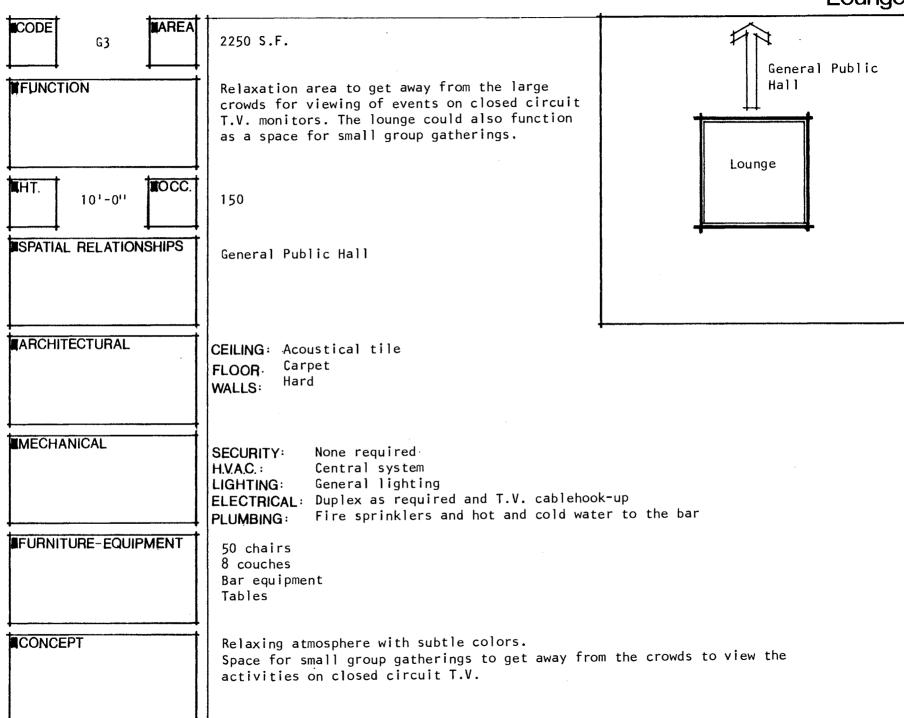


# General Public Seating

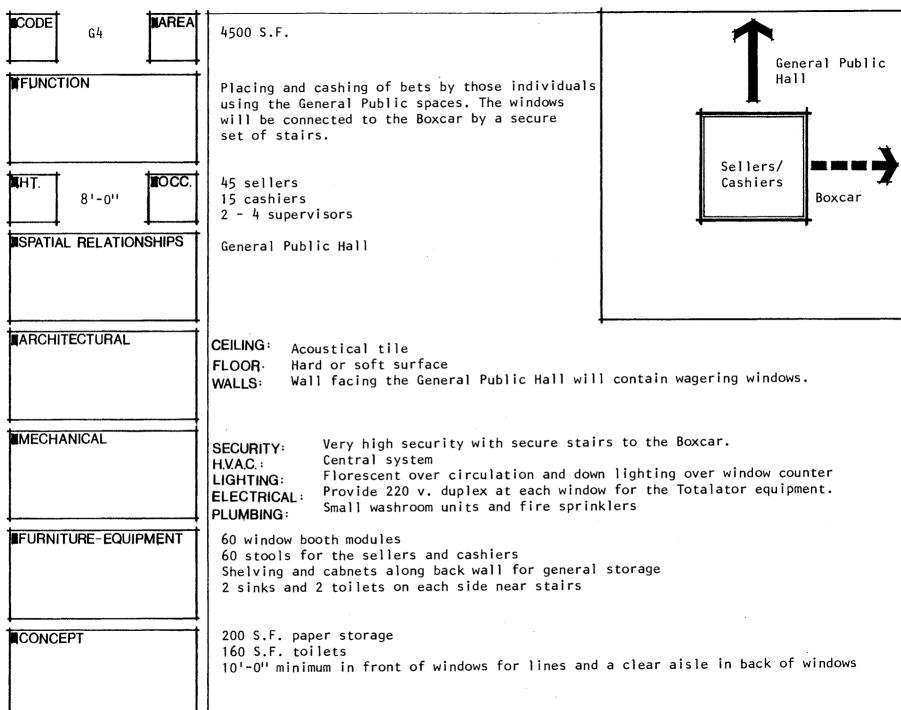


Cherokee Downs Horse Racing Facility

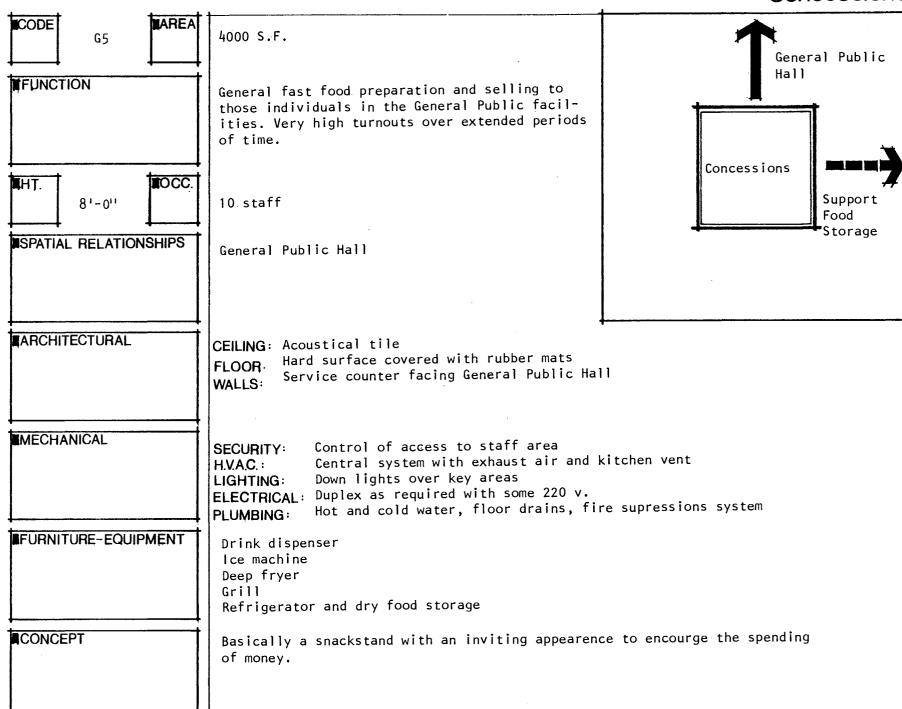
Lounge

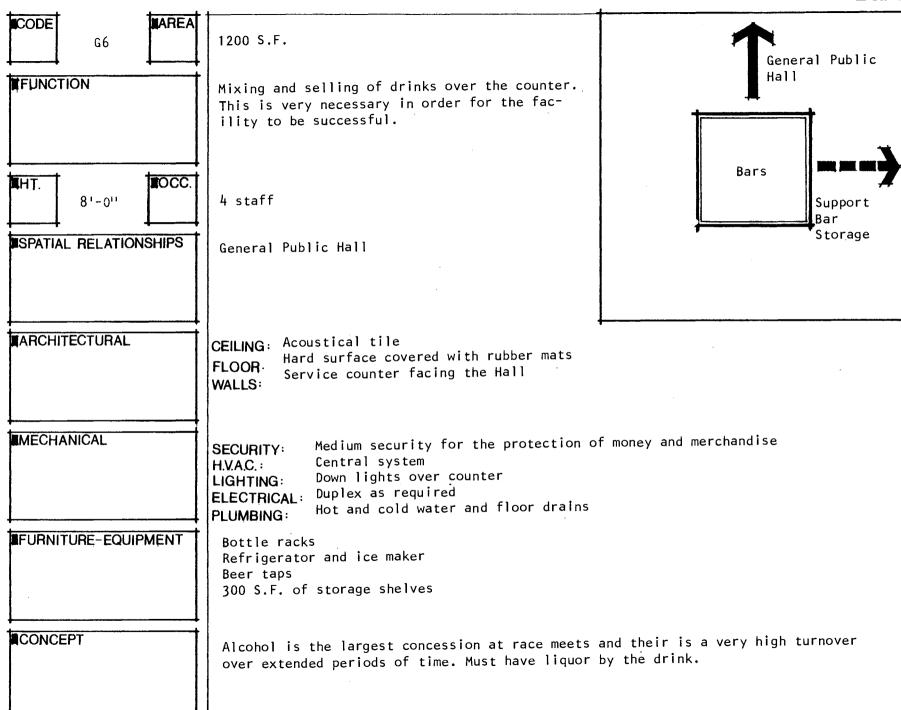


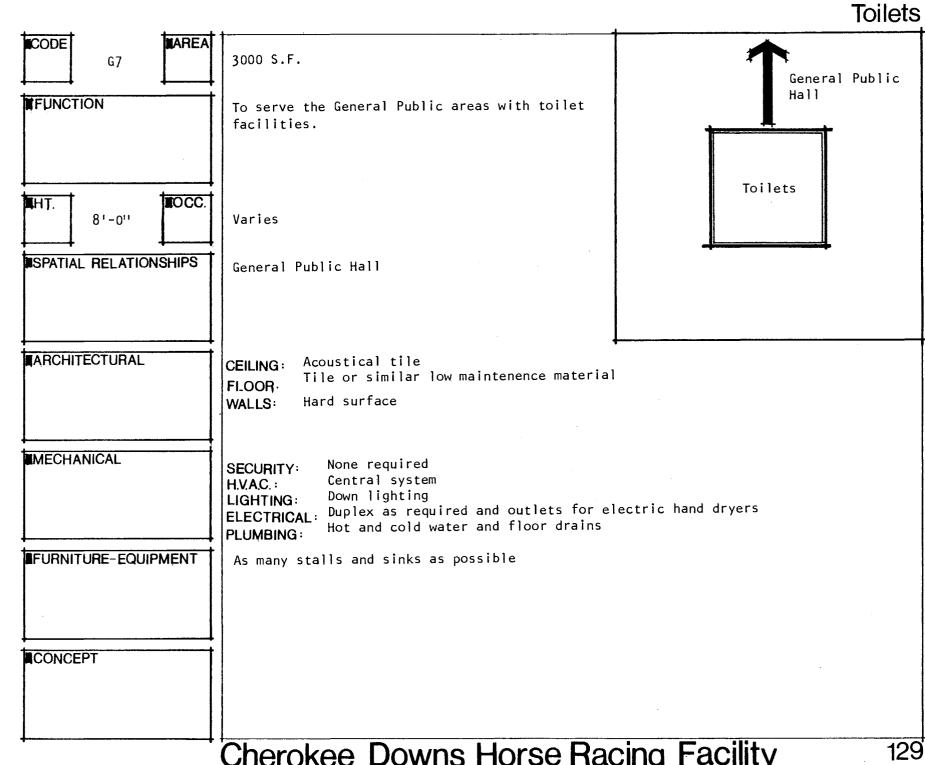
## Sellers/Cashiers

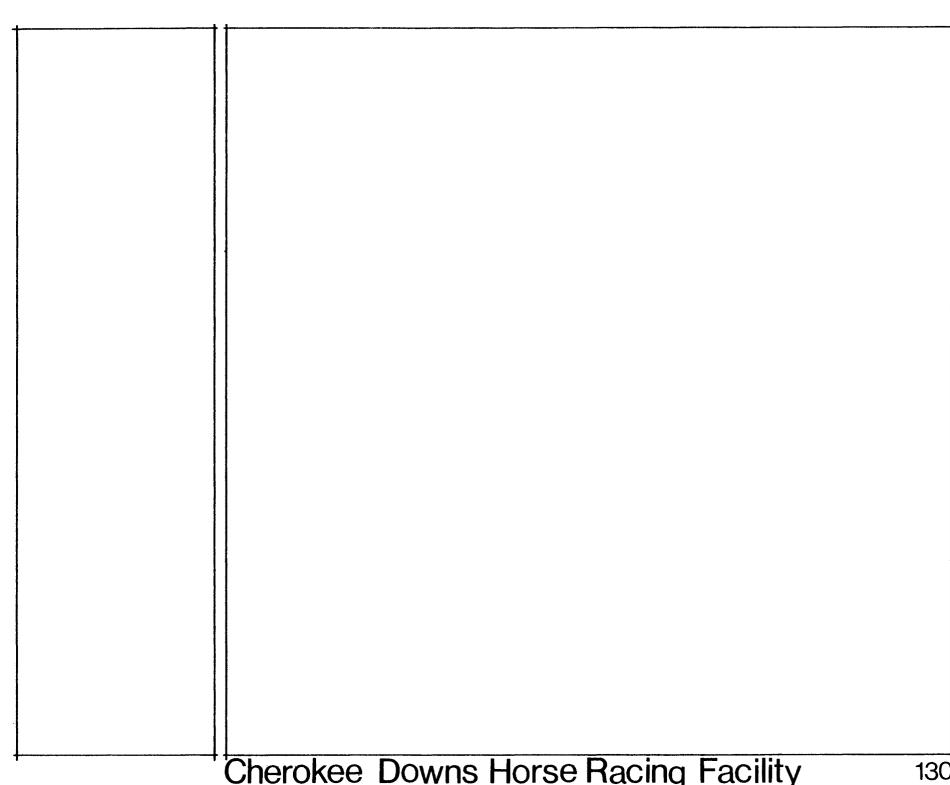


# Concessions

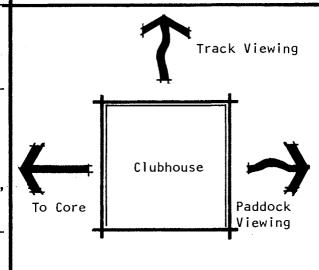








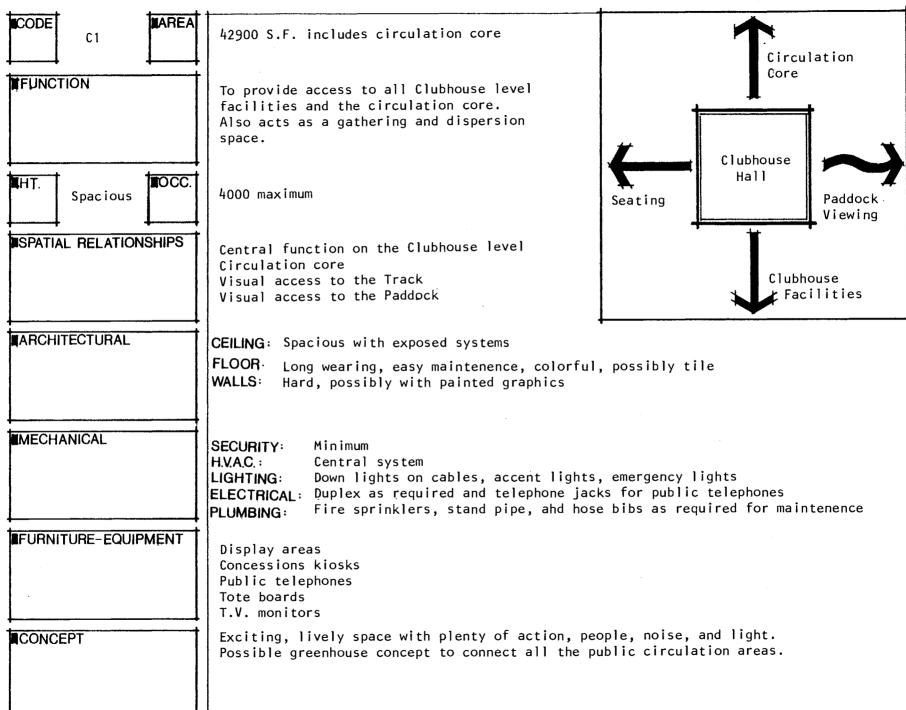
The Clubhouse level or area is open to the general public at a slightly higher gate fee than the General Reserved Seating area. The public uses this area as an affordable way to gain pyscological prestige and a higher quality of facilities and services. The benefits include a more spacious seating arrangement, food servive in the table area, exclusive access to the Jockey Club, and an overall more dignified appearence. The seating arrangement is made up of Box Seats, made up of boxes of six seats, and Table Seating, for parties of 2-6 people. Therefore, the Clubhouse level is designed to give a higher quality and more dignified facilities to the general public at an affordable gate price. The Clubhouse Hall should also be connected to the other circulation areas and have an area for the viewing of activities in the Paddock area.

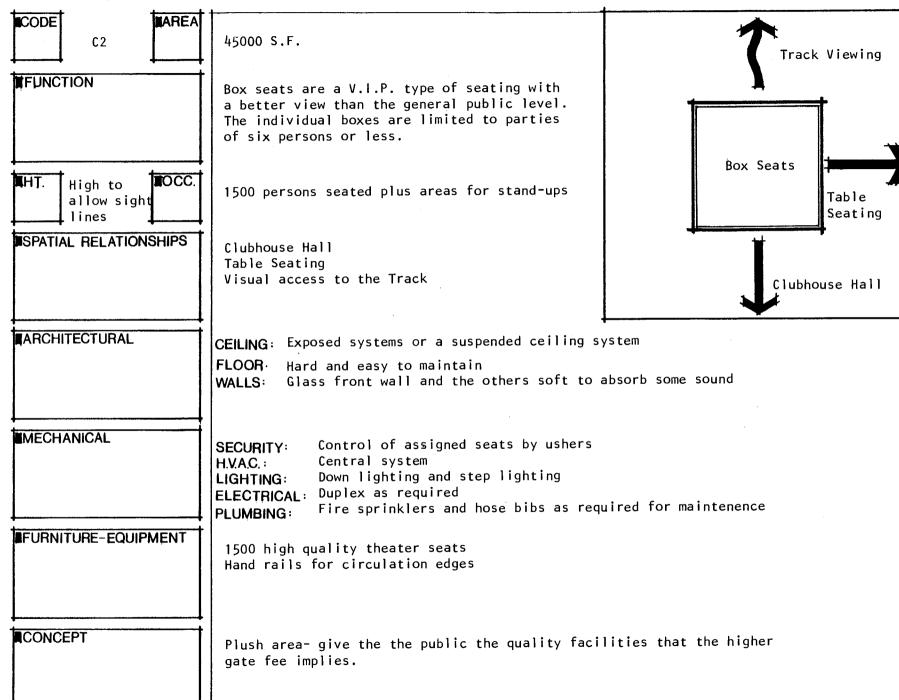


#### Space Requirements

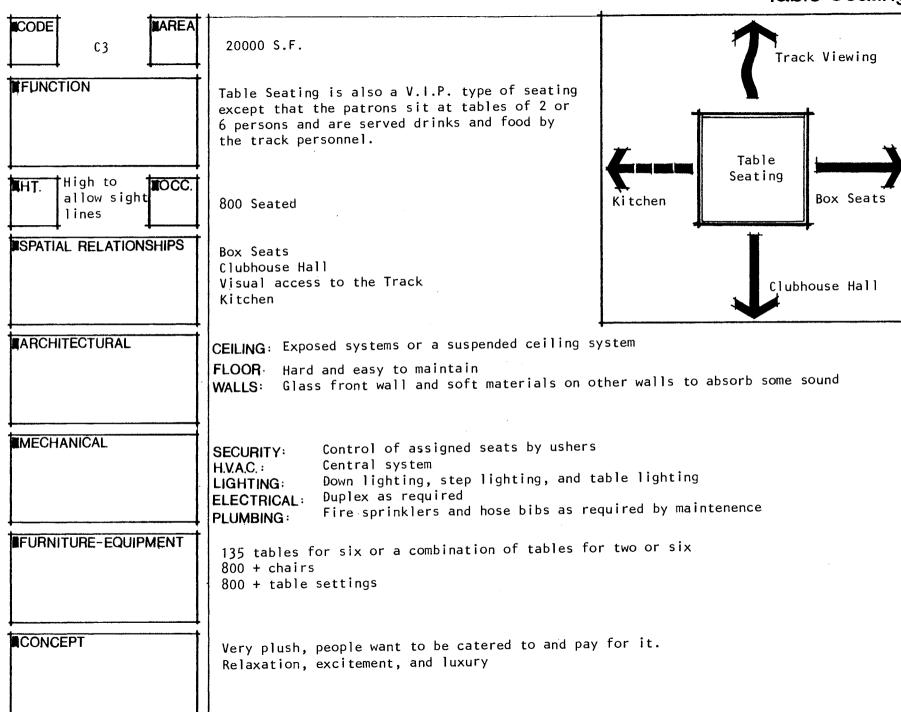
C1	Clubhouse Hall		42900	S.F.
C2	Box Seats		45000	S.F.
C3	Table Seats		20000	S.F.
C4	Clubhouse Hall Sellers and Cashiers		3500	S.F.
C5	Concessions		3750	S.F.
c6	Clubhouse Bars		1125	S.F.
<b>C7</b>	Jockey Club Lounge		2000	S.F.
с8	Kitchen		7500	S.F.
<b>C9</b>	Public Toilets		3000 <sup>.</sup>	S.F.
C10	General Storage		2000	S.F.
		Total	130775	S.F.

### Clubhouse Hall

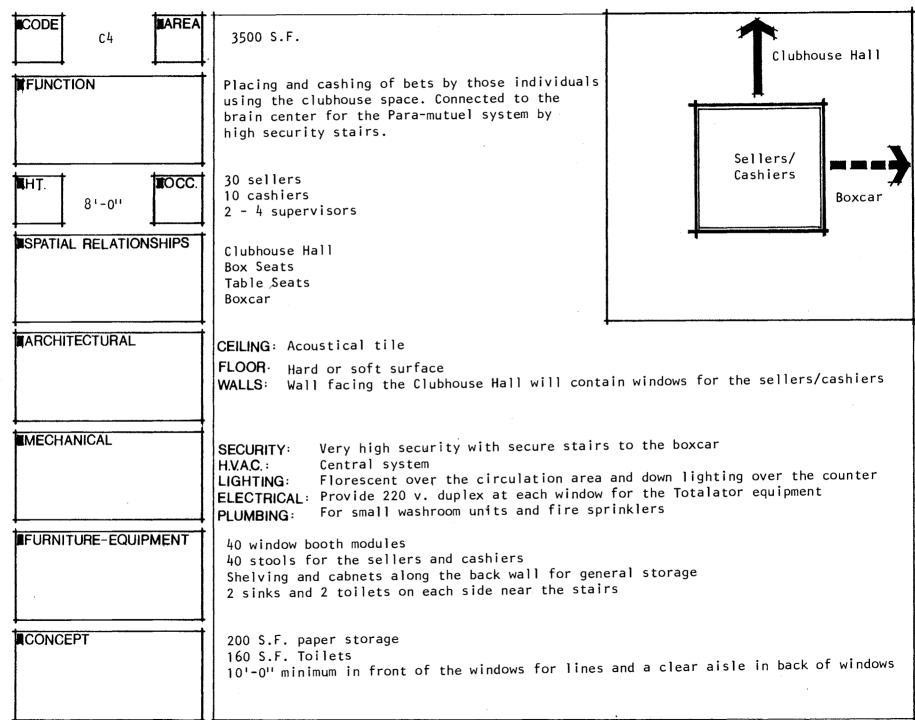




**Table Seating** 

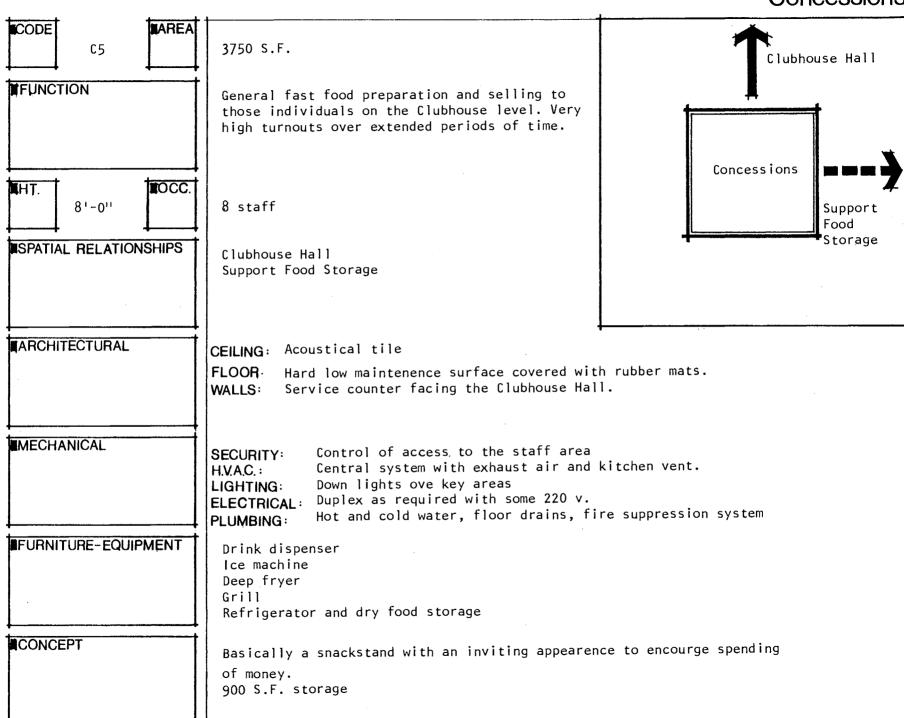


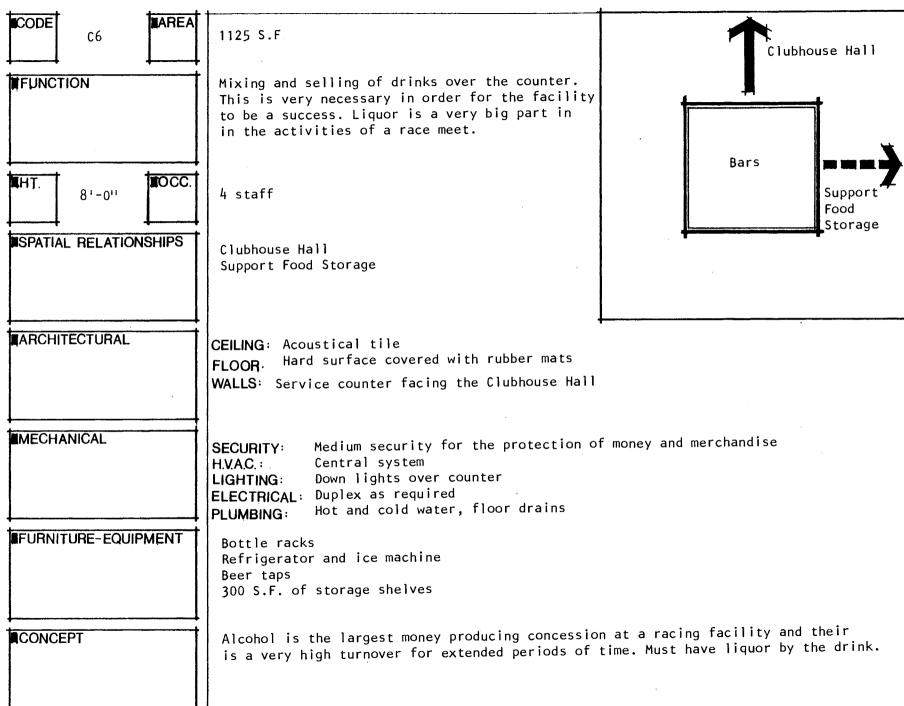
## Sellers/Cashiers



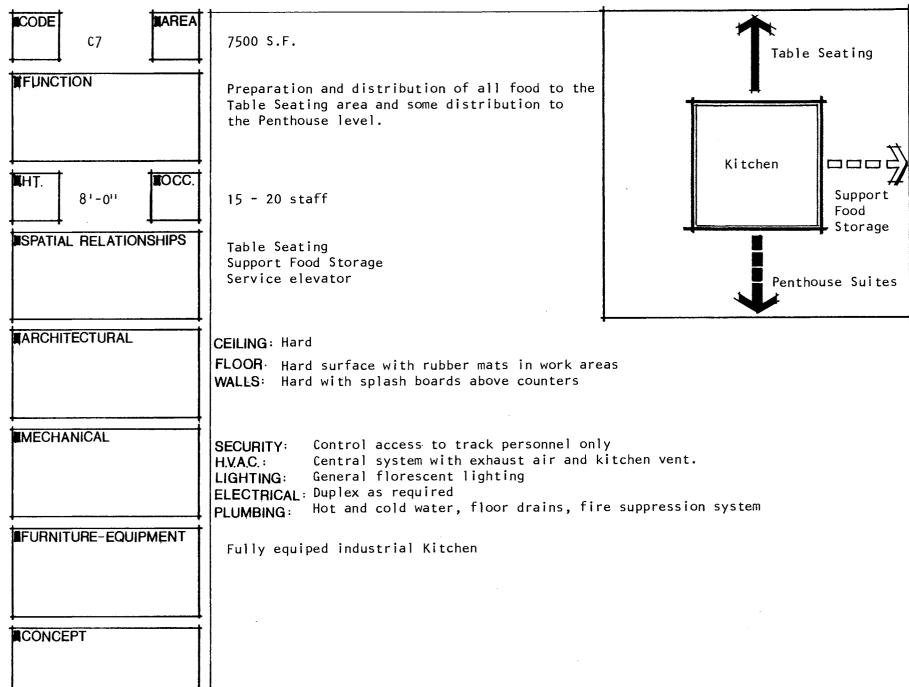
## Concessions

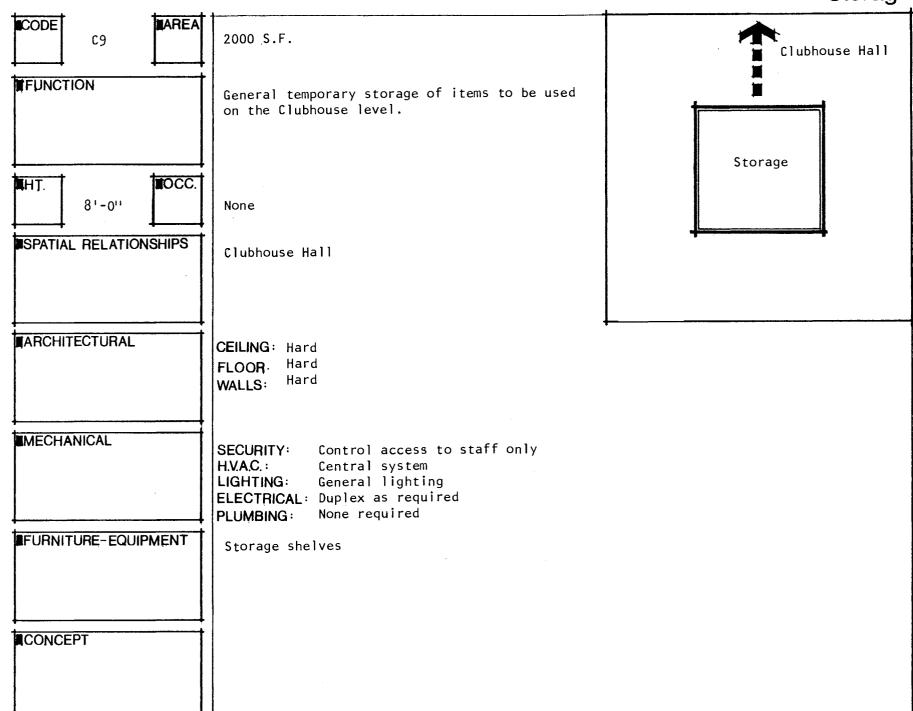
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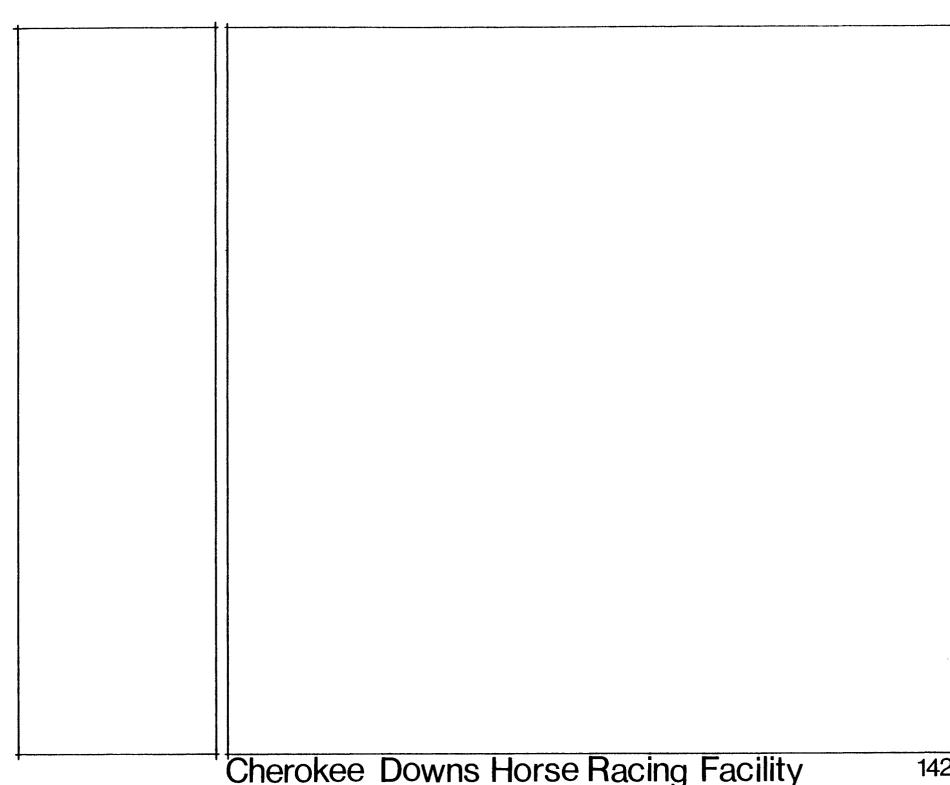




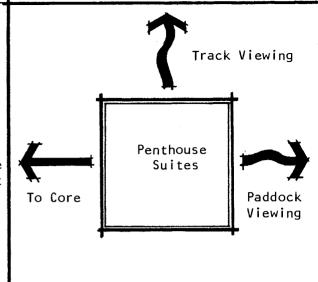






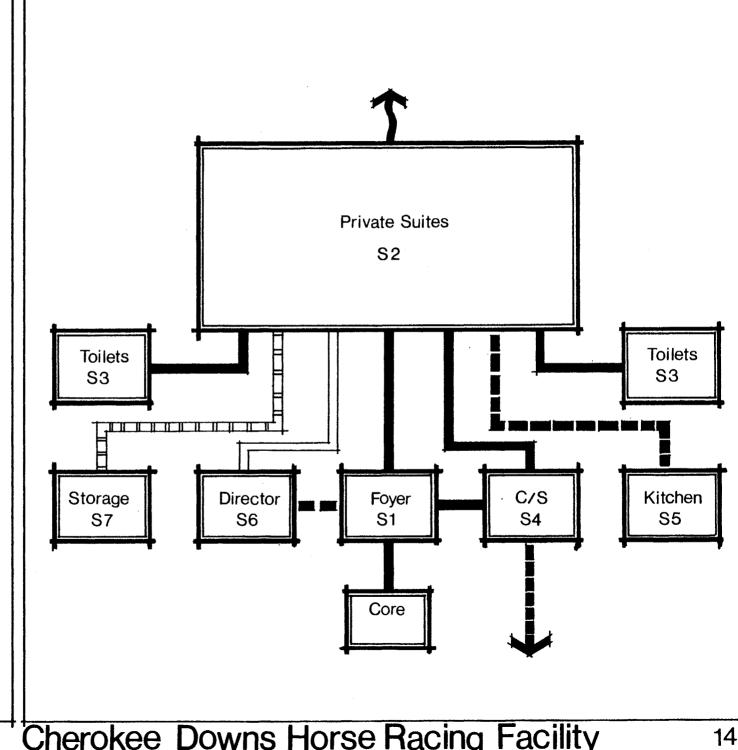


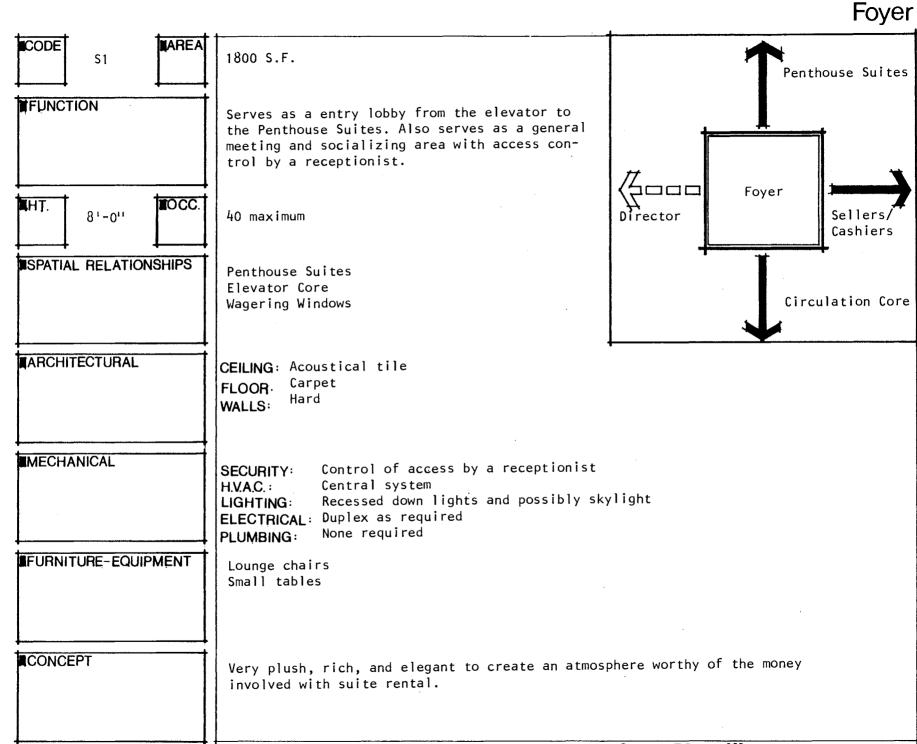
The Penthouse Suite level is private and very exclusive. This area should be secluded from the general public areas and access should be controlled to provide security for the suite owners. Therefore, the area is accessable only to the suite owners and their guests, with continuous food and wagering service provided by the Penthouse employees. The individual suite design is open to the owners to express their personal taste and create the desired atmosphere for a race meet. The common areas are to be soft surfaces of high quality to express the dignity and exclusive nature of suite ownership at Cherokee Downs.



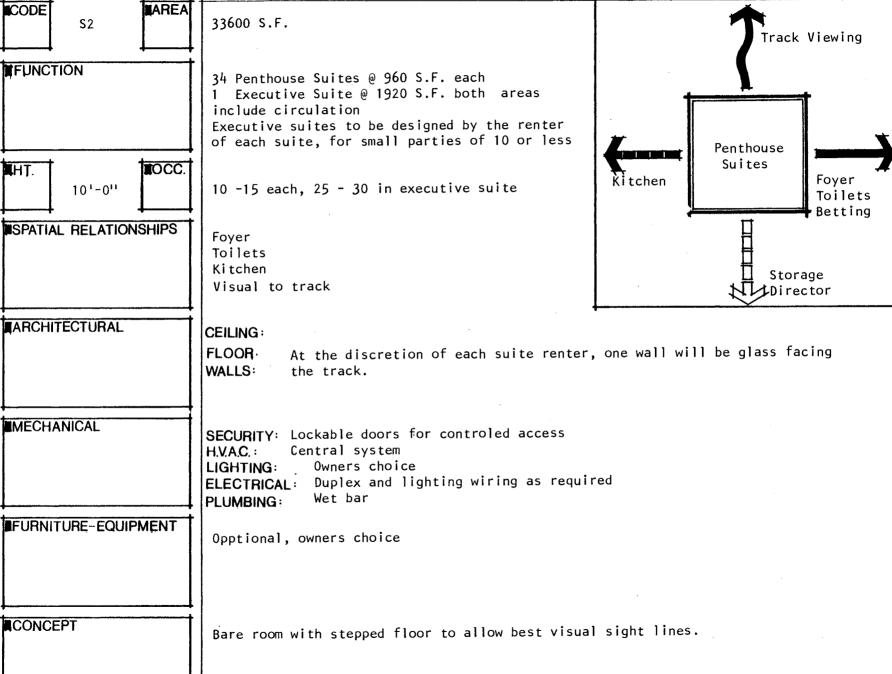
#### Space Requirements

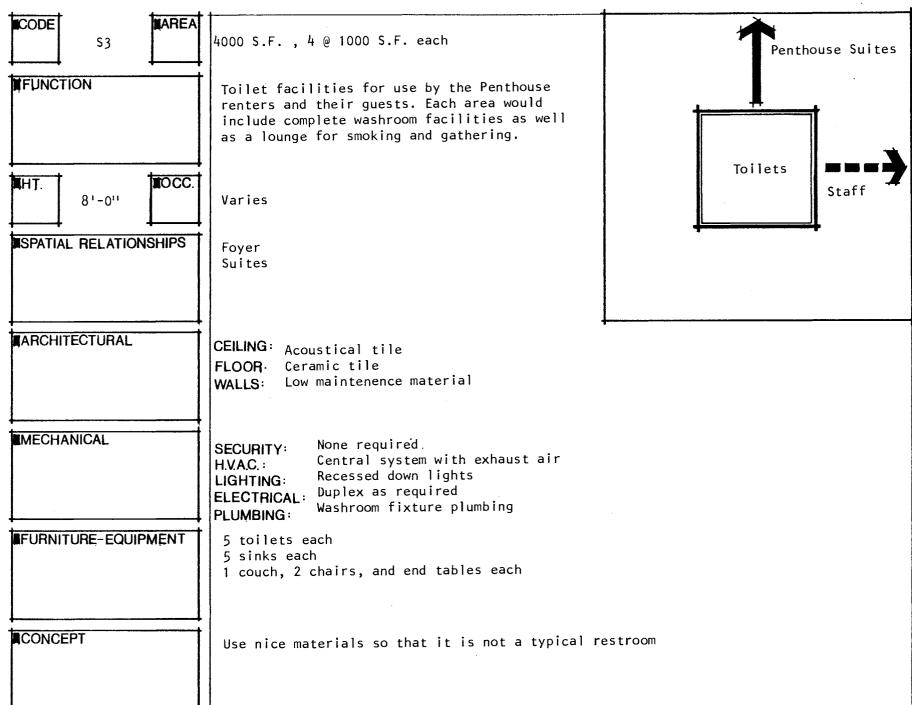
<b>S</b> 1	Foyer		1800 S.F.
<b>S</b> 2	Private Suites		33600 S.F.
\$3	Toilets and Lounge		× 4000 S.F.
. S4	Penthouse Sellers and Cashiers		1200 S.F.
<b>S</b> 5	Kitchen		1200 S.F.
s6	Directors Office		1000 S.F.
<b>S</b> 7	General Storage		1000 S.F.
		Total	47300 S.F.



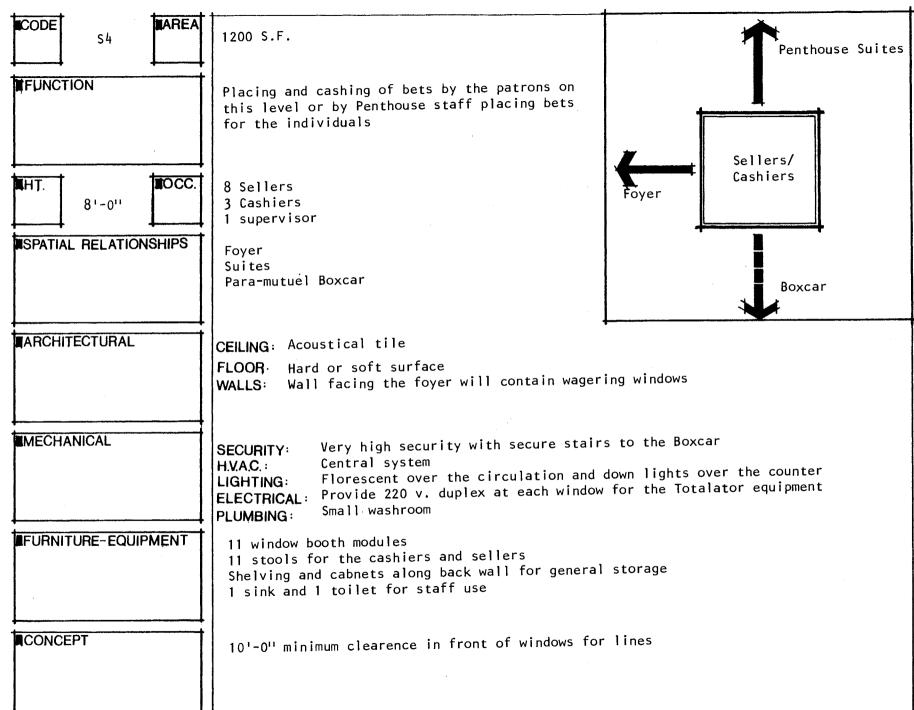


# Penthouse Suites Track Viewing

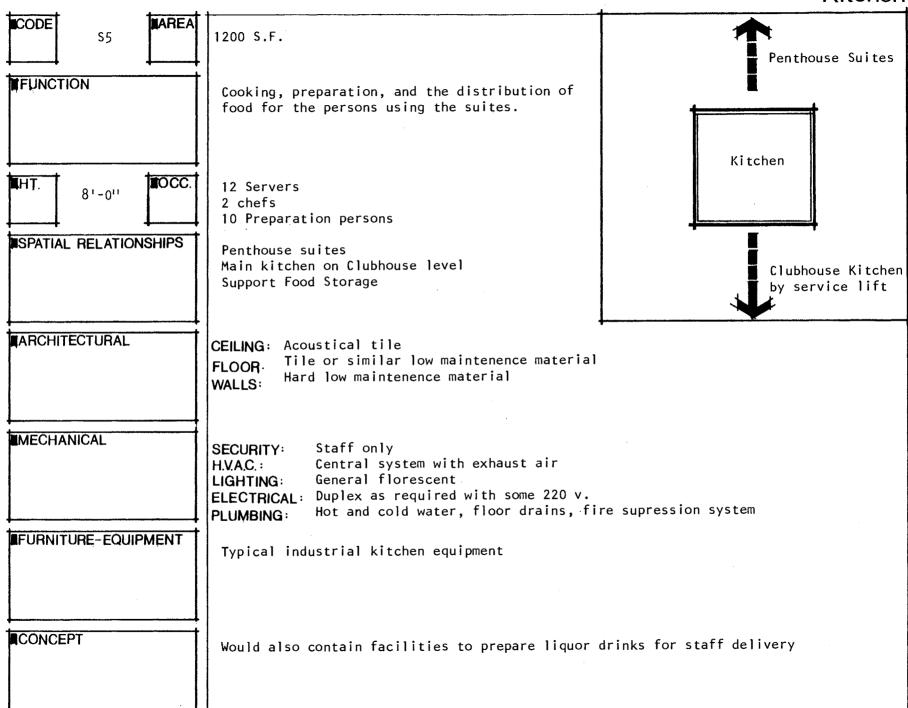


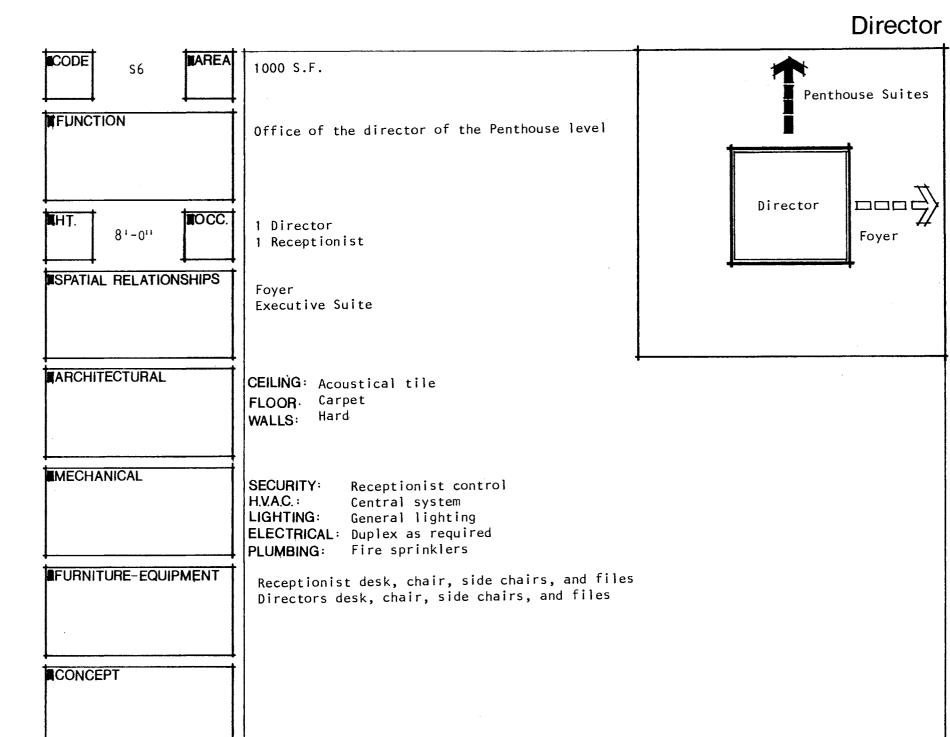


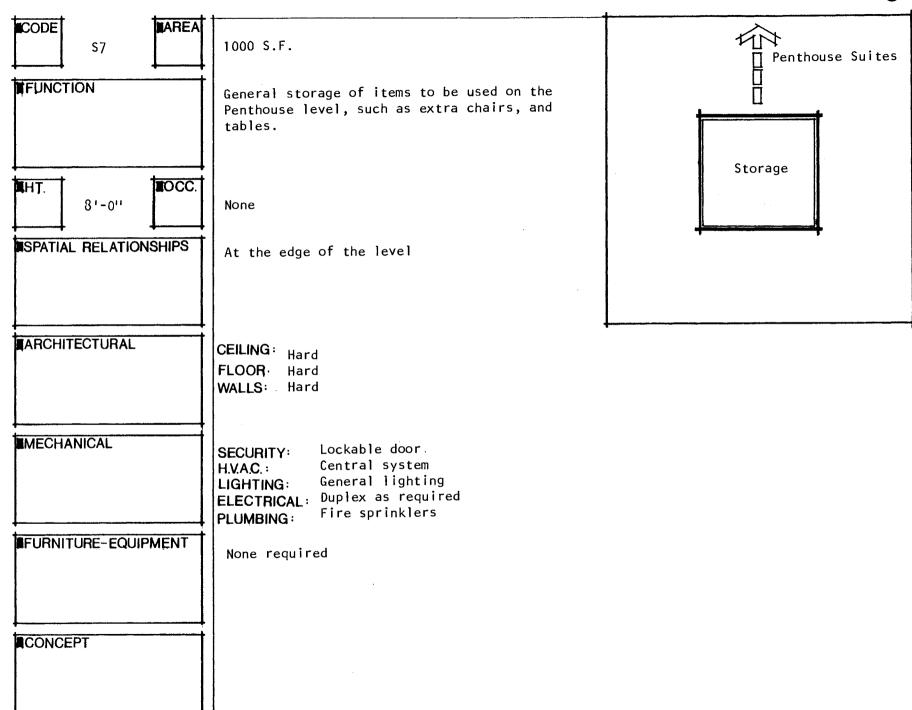
#### Sellers/Cashiers

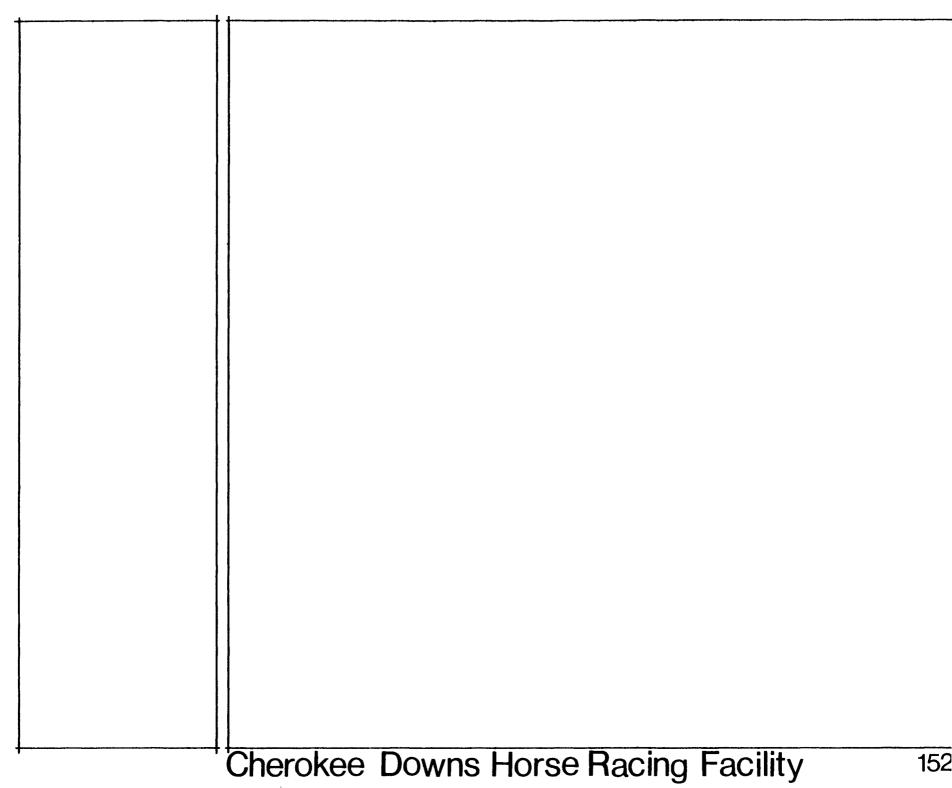


Kitchen









To Armored

Car

To Security

rOffice

Para-mutuel

Boxcar

To

Wagering

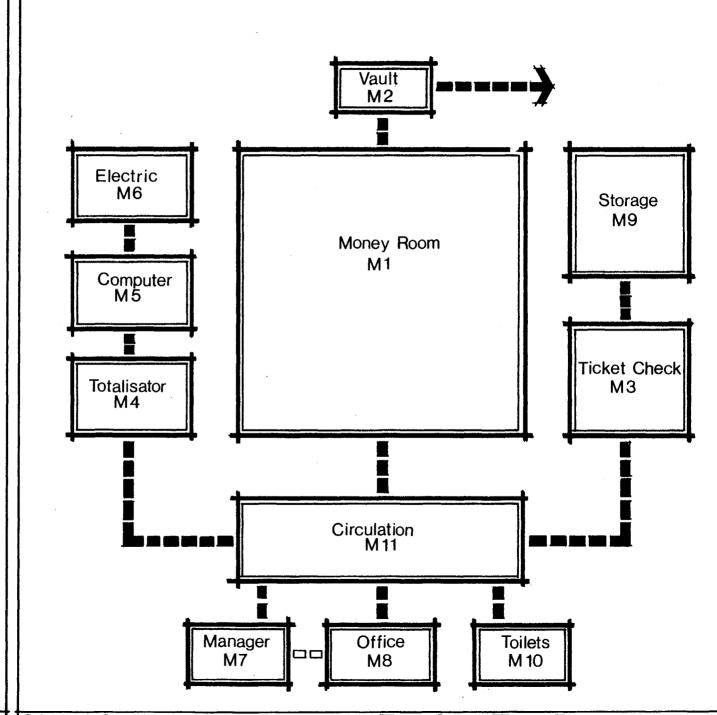
Windows

The Totalator system and all the money functions are housed in a space called the "Boxcar". The Boxcar is a very high security area usually suspended between levels with a secure circulation system connecting all the Seller/Cashier Windows to the Boxcar. The Boxcar contains all of the Totalator equipment, computer room, accounting department, vault, and an office for the state and federal tax collectors. Primary access to the Para-mutuels area should be on the entrance level through the security office, up an enclosed stair system to the Boxcar and the wagering windows. Another very important link is the very high security link to the armored car pick-up. The reason for the magnitude of security is that for example - Santa Anita Park in California averages over 5.3 million dollars in para-mutuels per race meet.

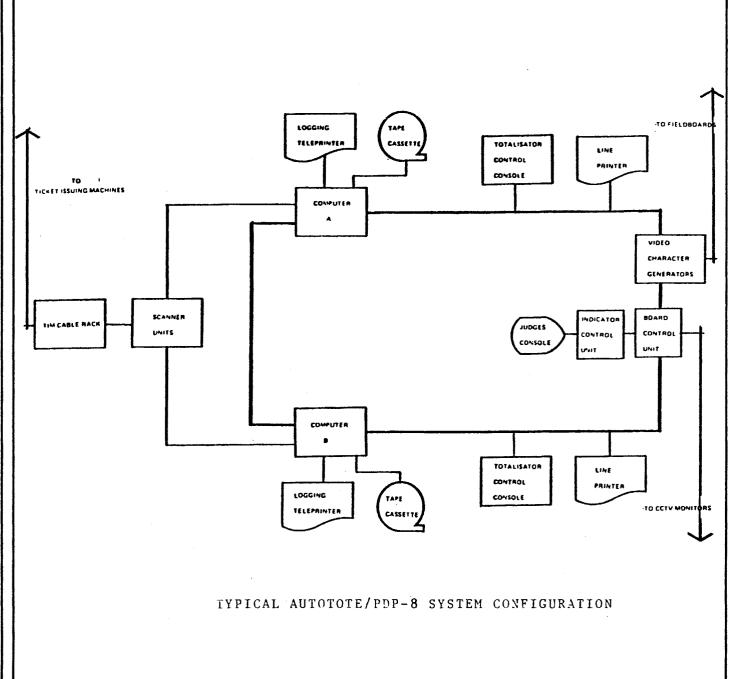
Key words: Security and Control

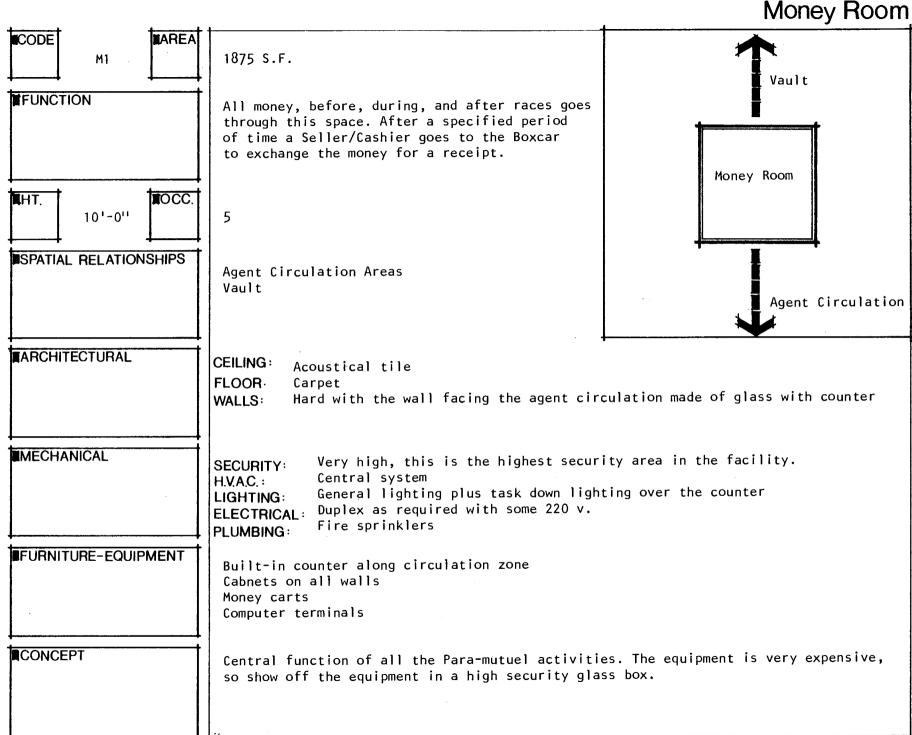
#### Space Requirements

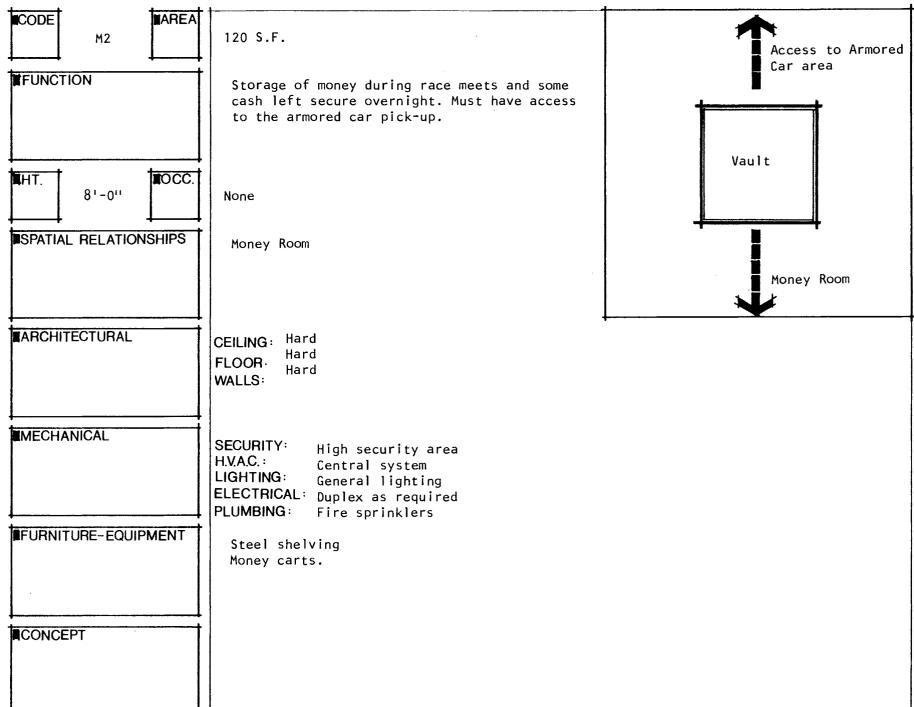
M1	Money Room		1875 S.F.
M2	Vault		120 S.F.
М3	Ticket Check		700 S.F.
M4	Mutuels Room		360 S.F.
M5	Computer Room		625 S.F.
м6	Maintenence Room		220 S.F.
M7	Managers Office		250 S.F.
м8	Tax Collectors Office		250 S.F.
M9	Paper Storage		700 S.F.
M10	Toilets		220 S.F.
M11	Circulation		1400 S.F.
		Total	6720 S.F.

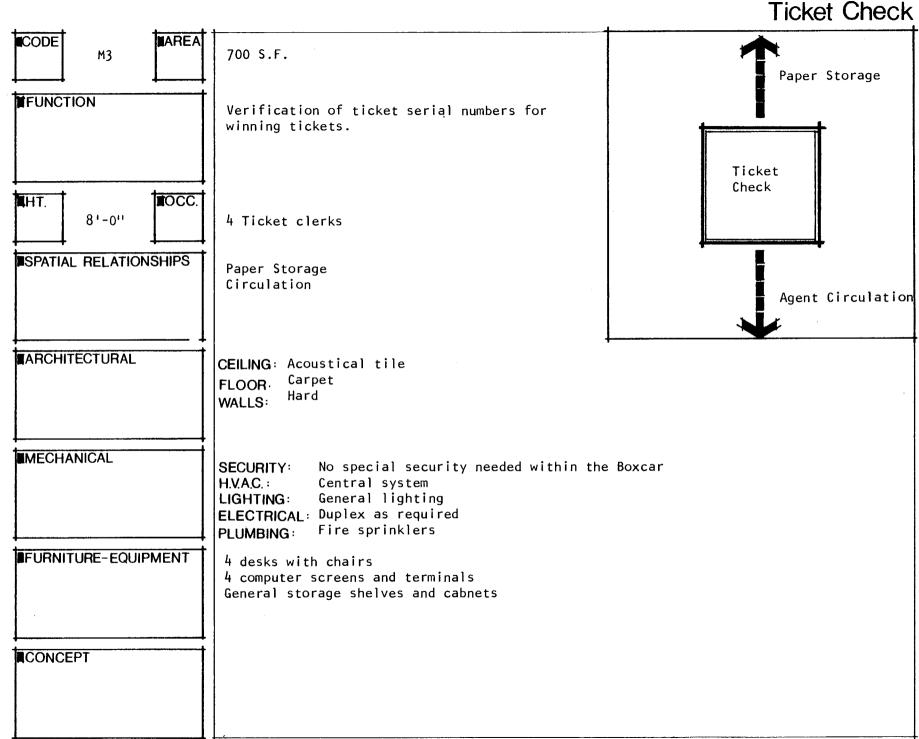


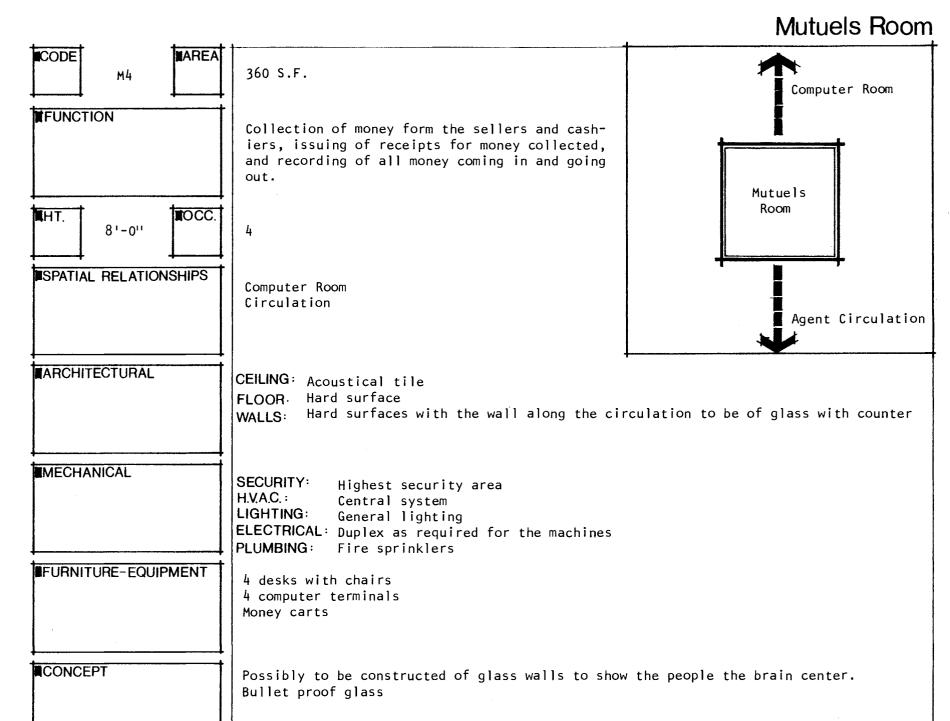
The A.T.I. system is designed by the American Totalistor Co. designers for each specific application to fit the track and its individual needs. The A.T.I. Totalistor system controls and record every activity from the issuing of tickets to the posting of odds on the display boards within the facility. One benefit of the system is the speed and accuracy of the records and reports issued by the machine to the personnel, even before the race is over.





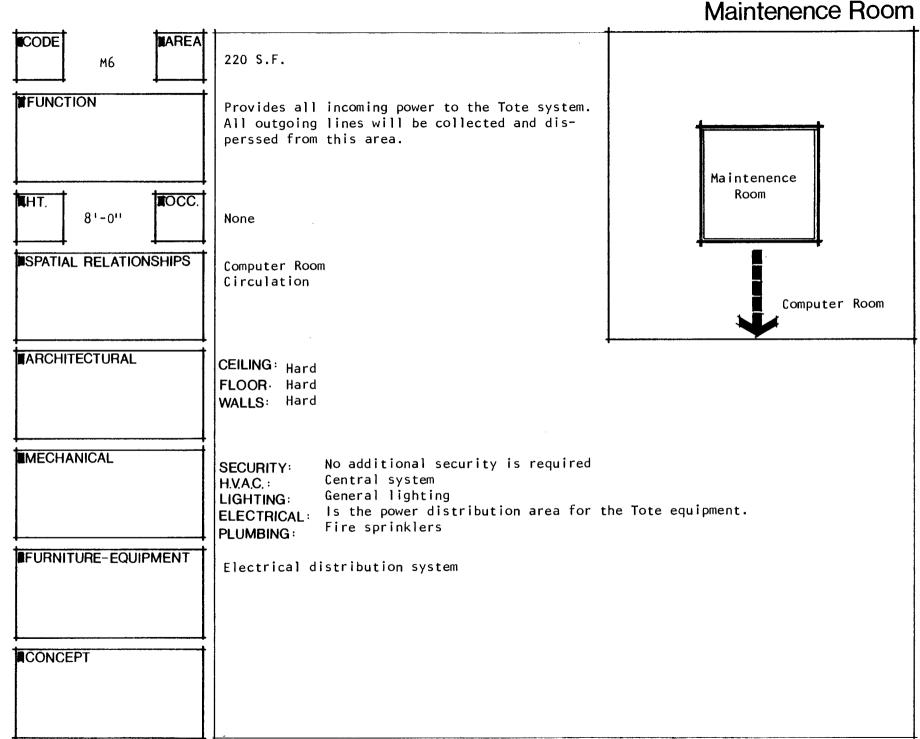






Computer Room CODE AREA 625 S.F. M5 Maintenence Room FUNCTION This is where the heart of the Totalisator computer system is housed. The main system and the backup system are located in this room. Computer Room TOCC. MHT. 10'-0" **I**SPATIAL RELATIONSHIPS Mutuels Room Circulation Maintenance room Mutuels Room **EARCHITECTURAL** CEILING: Acoustical tile Sub floor with removable access panels for ease of moving or updating system. FLOOR. Hard surface WALLS: Large doors to remove equipment for repair or updating. **MECHANICAL** SECURITY: Very high security with access to programmers only. H.V.A.C.: Central system with an additional system to help cool th equipment General lighting with task lighting, over key areas LIGHTING: ELECTRICAL: Both normal and 220 v. duplexs as required PLUMBING: Fire suppression system, probably foam. **M**FURNITURE-EQUIPMENT See following sheet CONCEPT Very secure area with the possiblity of glass walls to show off the system

Computer Roon 25' IBM KEYPUNCH **ENGINEER'S** SECURITY DESK CABINET VIDEO TERMINAL ΤV MONITOR SPARE VIDEO TERMINAL MUTUELS ROCM LOGGING TELETYPEWRITER A B BENEATH LOGGING HIGH SPEED HIGH SPEED CARD CARD TELETYPE PRINTER PRINTER READER READER WRITER C INFORMATION COLTAMBOE DISPLAY DISPLAY SYSTEM SYSTE !! TE. STIPE DOCUMENT READER TABLE COMPUTER V. = TER SYSTEM MAINTENANCE PHONE POOM SPARE JUDGES TOTE TOTE CO:-SOLE CONTROL CONTROL CP40 DESK TOP DESK TOP CONSOLE CONSOLE READER 8 GRACE CRAOB COMPUTER COMPUTER SCANNER SCANNER SCANNER CONTROL CONTROL COMPUTER INDICATO TIM 3 2 3 UNIT UNIT С CONTROL CABLE RACK COMPONENT SPARES COMPUTER ROOM CABINET Cherokee Downs Horse Racing Facility 16

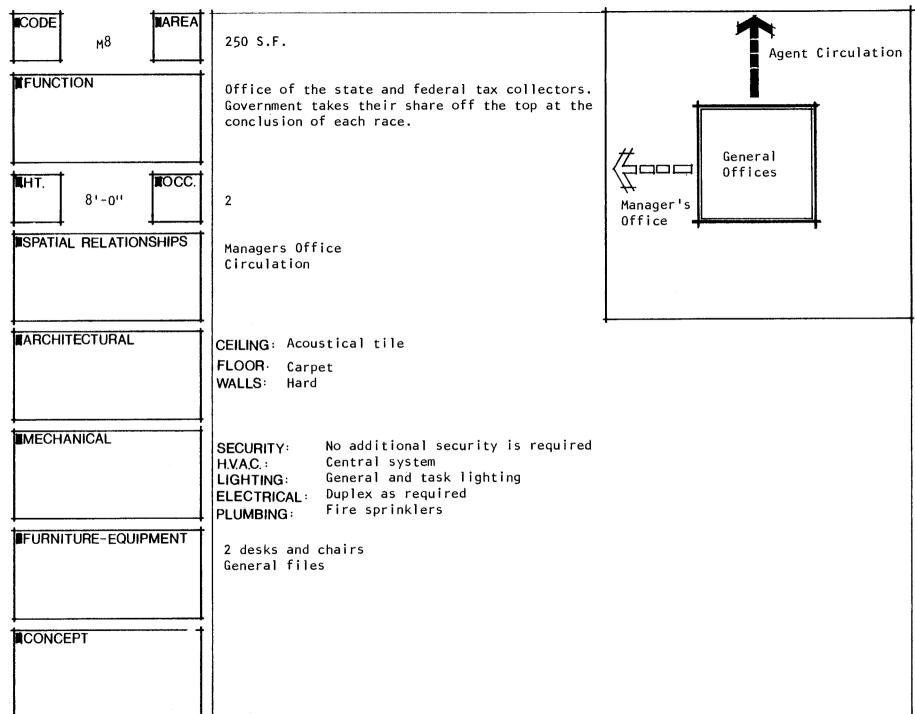


Manager's Office CODE MAREA 250 S.F. M7 Computer Room FUNCTION Overseer and manager of all Para-mutuel functions. Direct access to the computer room and access to all Para-mutuel functions Manager's Office TOCC. HHT. 1 Manager 81-011 General 1 Secretary Offices SPATIAL RELATIONSHIPS General Offices Computer Room Tote Room **EARCHITECTURAL** CEILING: Acoustical tile Carpet FLOOR. Hard, glass into computer room and mutuels room. WALLS: **EMECHANICAL** None required SECURITY: Central system H.V.A.C.: General lighting LIGHTING: Duplex as required **ELECTRICAL**: Fire sprinklers PLUMBING: **AFURNITURE-EQUIPMENT** 1 Executive desk and chair 2 side chairs 1 secretarial desk and chair Files CONCEPT

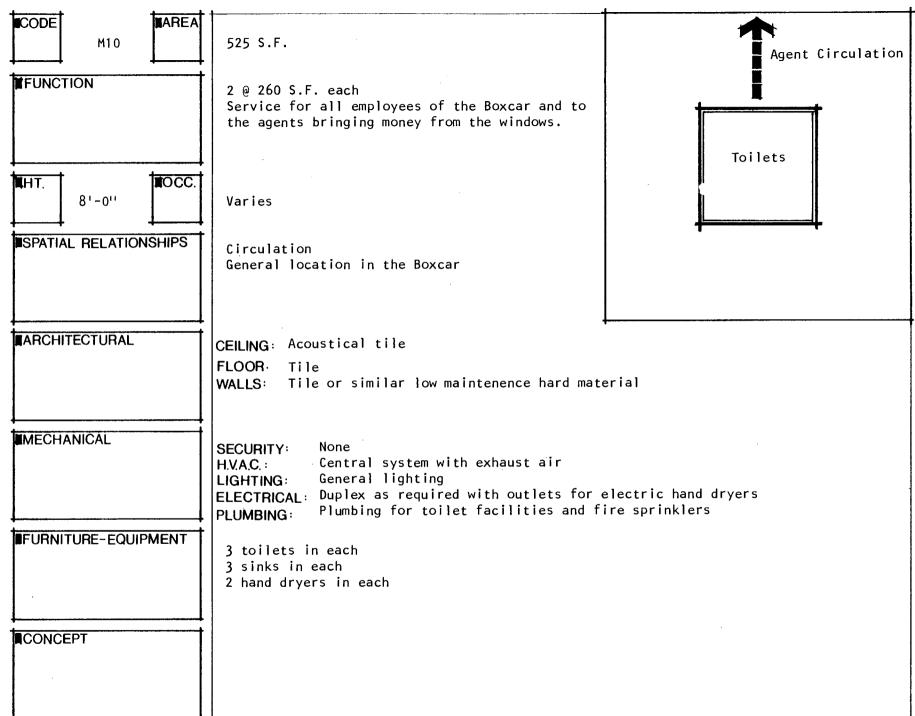
Cherokee Downs Horse Racing Facility

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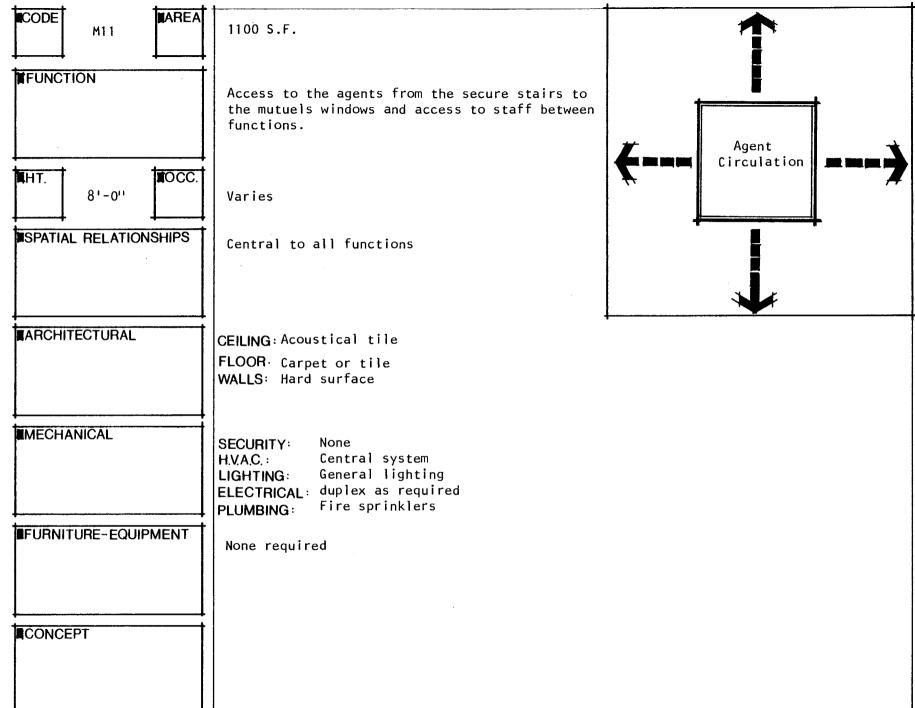
#### **General Office**

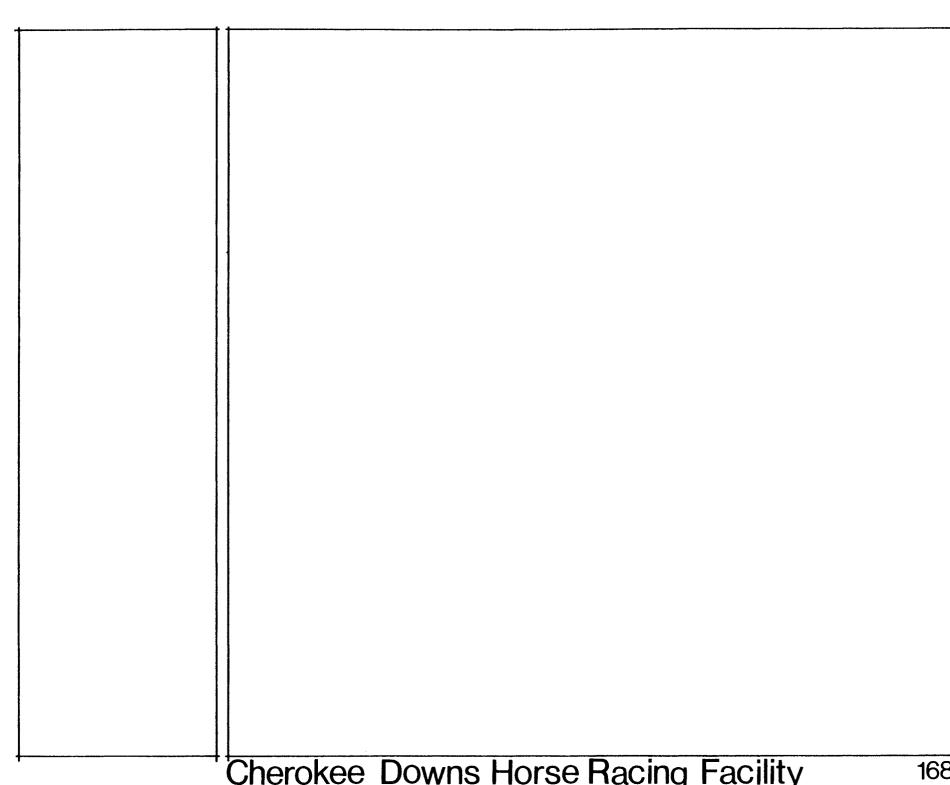


#### **Toilets**



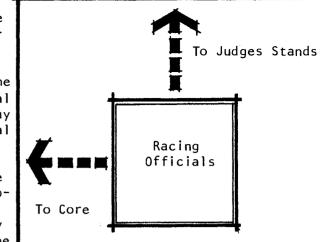
# Circulation





#### Racing Officials

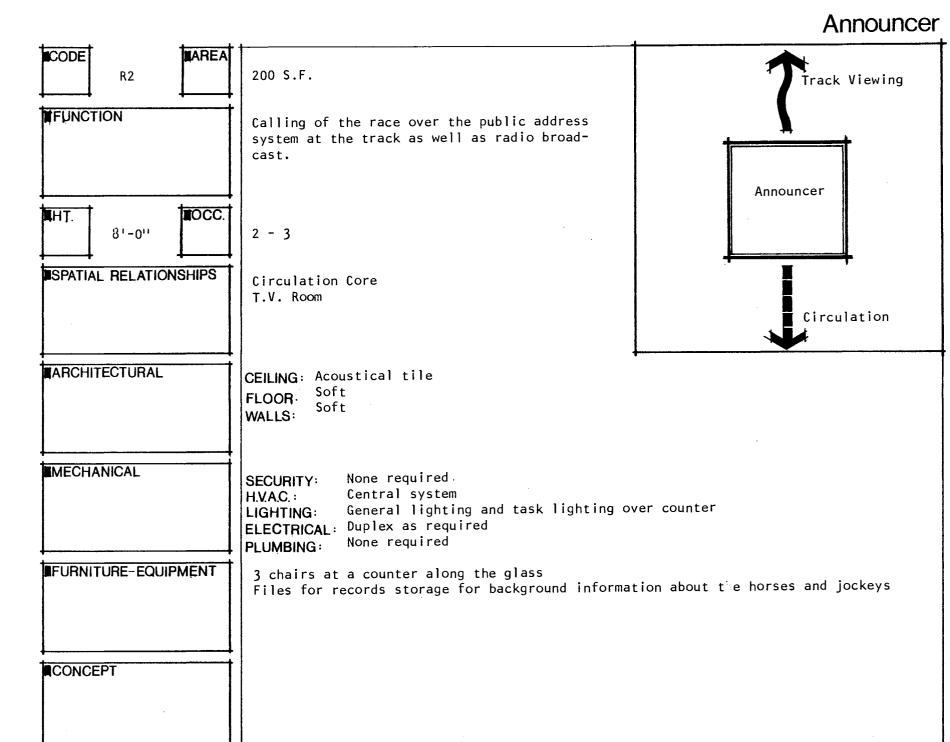
There are many Racing Officials involved in the running and officiating of a race meet. The optimum location is at the highest point in the Grandstand on one or two levels at the finish line to assure the best unobstructed view of the racing surfaces. The role of the racing official is to officiate the race, watching for foul play both visually and on T.V. monitors. The official is assisted by judges towers located on the turns and the backstretch containing either a racing steward of a camera. Also located on the Racing Official level is the photo finish equipment. The goal is to provide an area with the best unobstructed view while maintaining a very high level of security from persons entering the level.

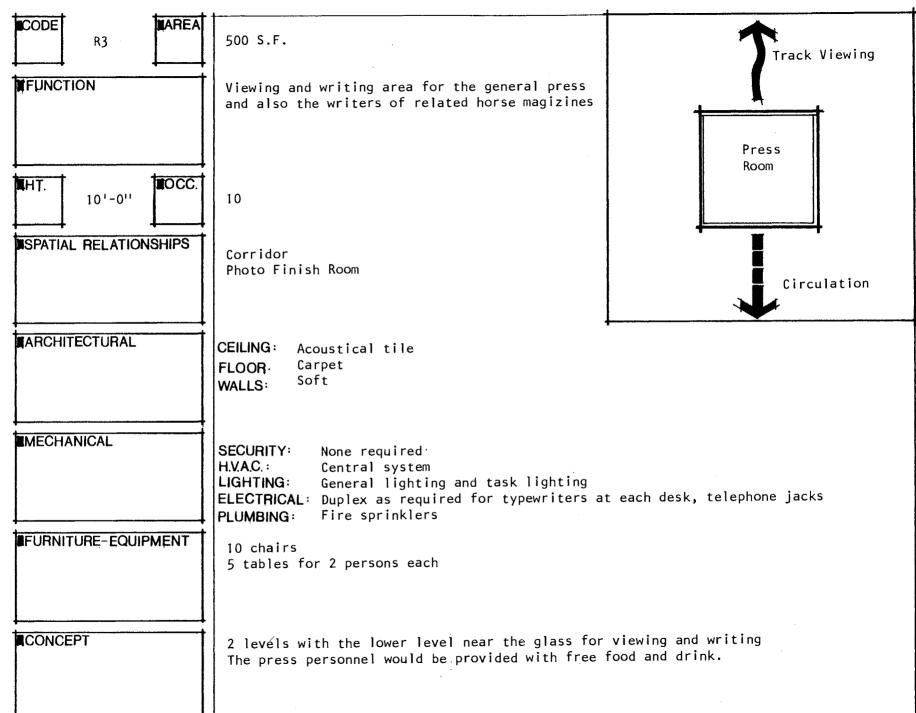


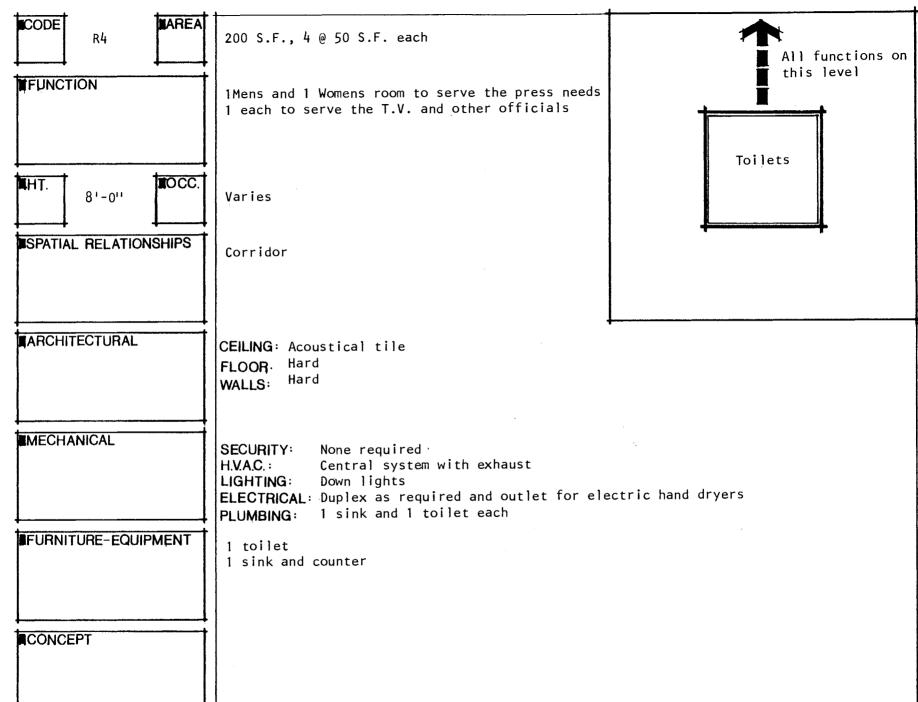
#### Space Requirements

R1	Judges Booth		300 S.F.
R2	Announcer (Track, Radio, T.V.)		200 S.F.
R3	Press Room		500 S.F.
R4	Staff Toilets		200 S.F.
R5	Photo Finish Equipment		400 S.F.
R6	T.V. Room		400 S.F.
R7	General Storage		200 S.F.
R8	Circulation		700 S.F.
		Total	3000 S.F.

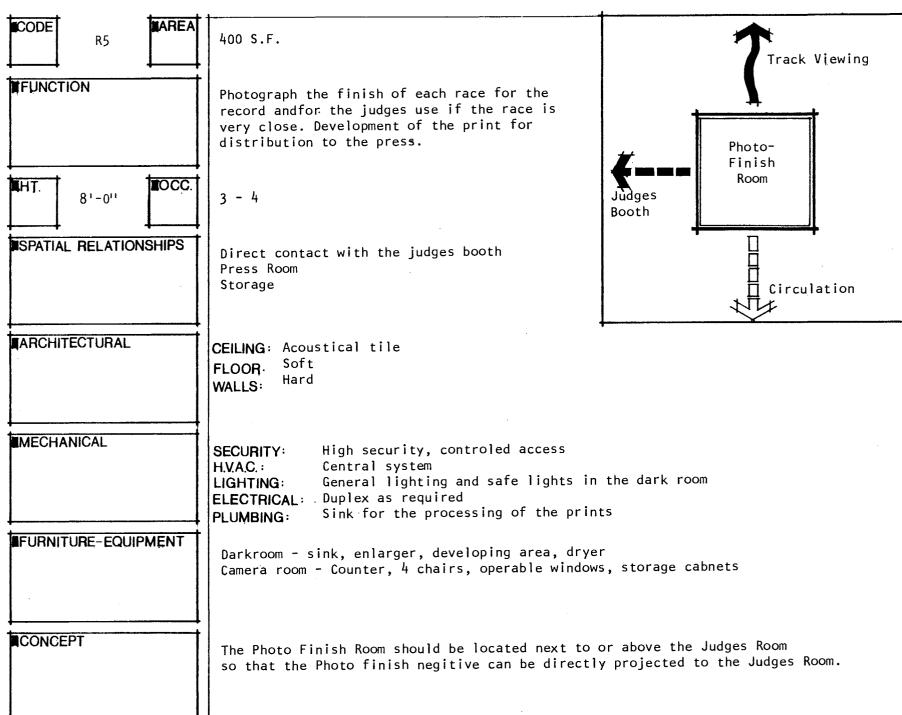
Judges Booth AREA CODE 300 S.F. R1 Track Viewing FUNCTION Official call of the race winners, judgement on any fouls committed during a race, and the reviewing of the race tape to verify the winner LAW - One of the 3 judges must view the race from the open air with no glass to block view. Judges Booth MOCC. MHT. Photo-81-011 3 Judges Finish INSPATIAL RELATIONSHIPS Direct access to Photo Finish Room through a hole in the floor or wall Judges toilet Circulation Circulation corridor ARCHITECTURAL CEILING: Acoustical tile Carpet, small balcony for viewing of the race by one judge FLOOR-Hard WALLS: MECHANICAL SECURITY: High security, admittance to judges only H.V.A.C.: Central system LIGHTING: General lighting ELECTRICAL: Duplex as required None required PLUMBING: **EFURNITURE-EQUIPMENT** Counter along the glass wall Closed circuit T.V. monitors  $6 \times 6$  darkroom for one judge for the viewing of the photo finish film CONCEPT Highest position in the Grandstand for the best, unobstructed views Very private and secluded from the other Racing Official areas

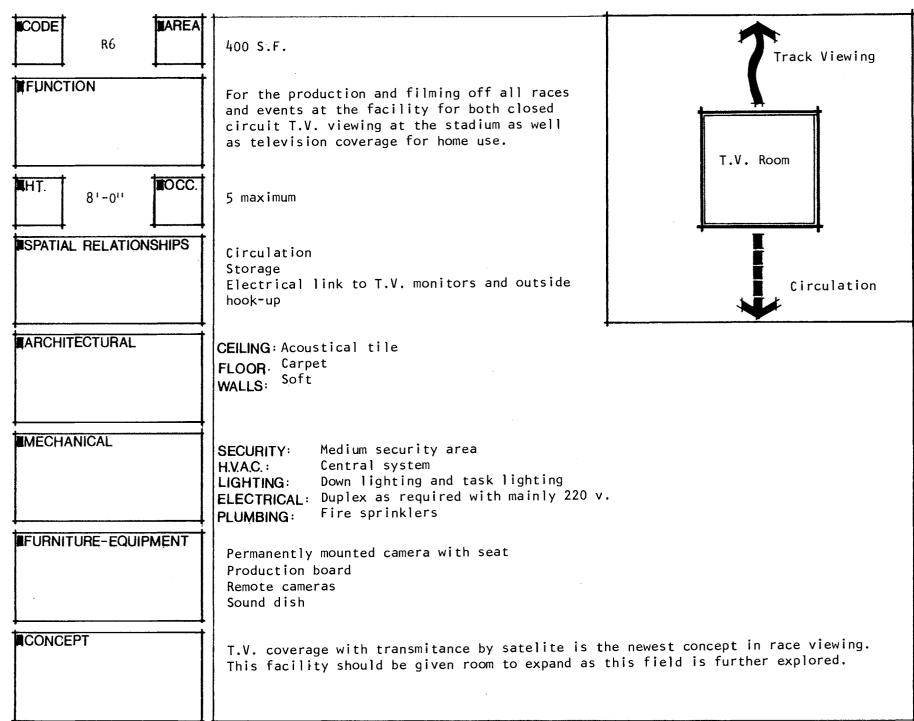


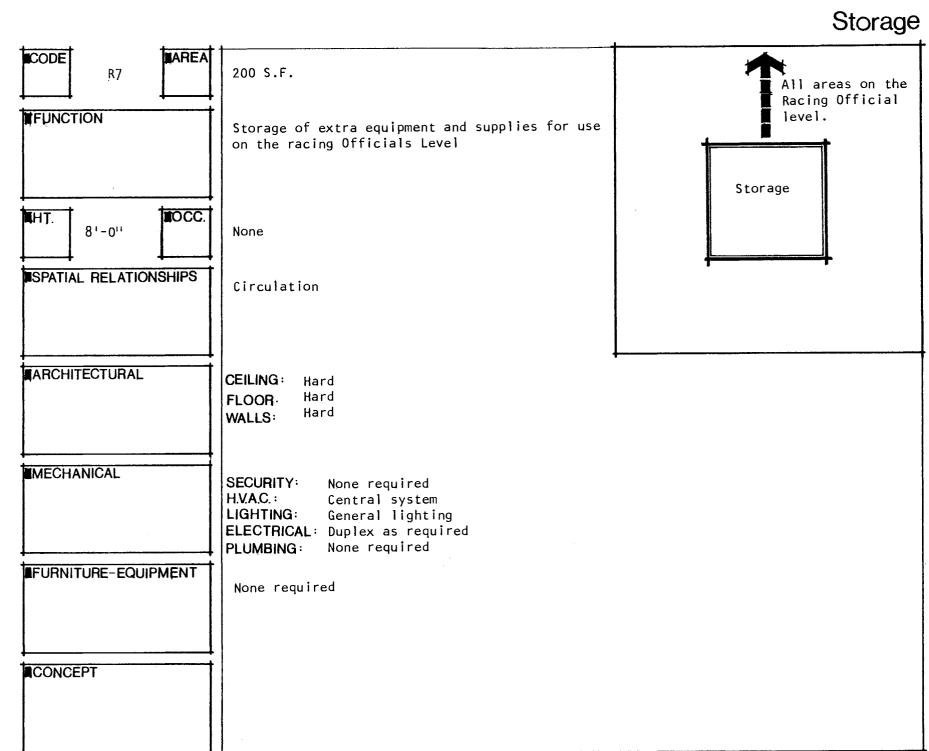




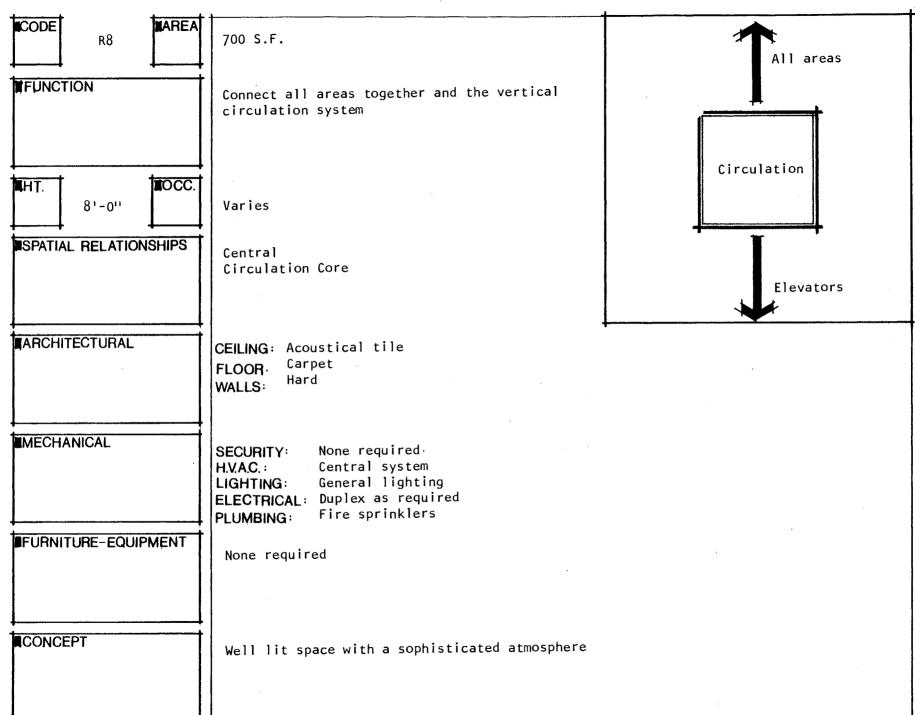
### Photo Finish

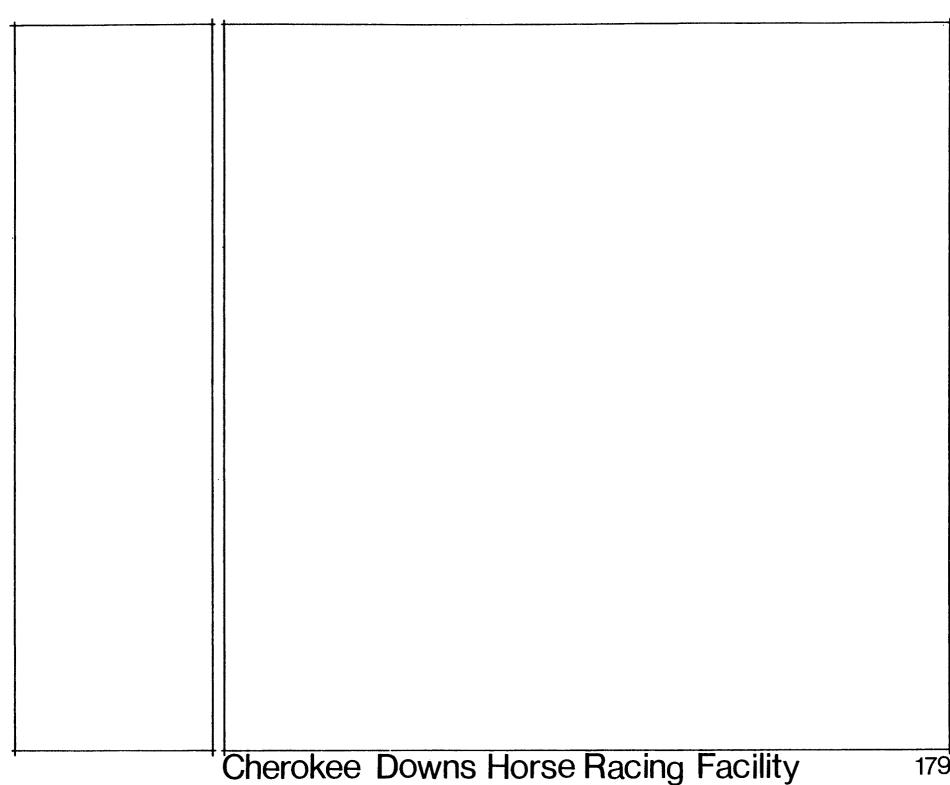






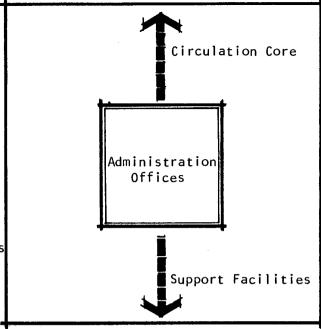
### Circulation





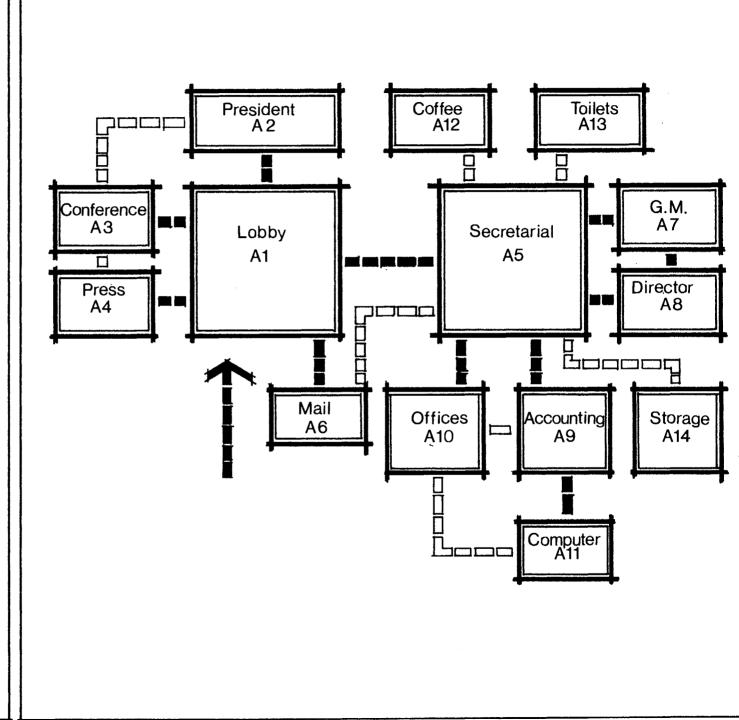
### Administration

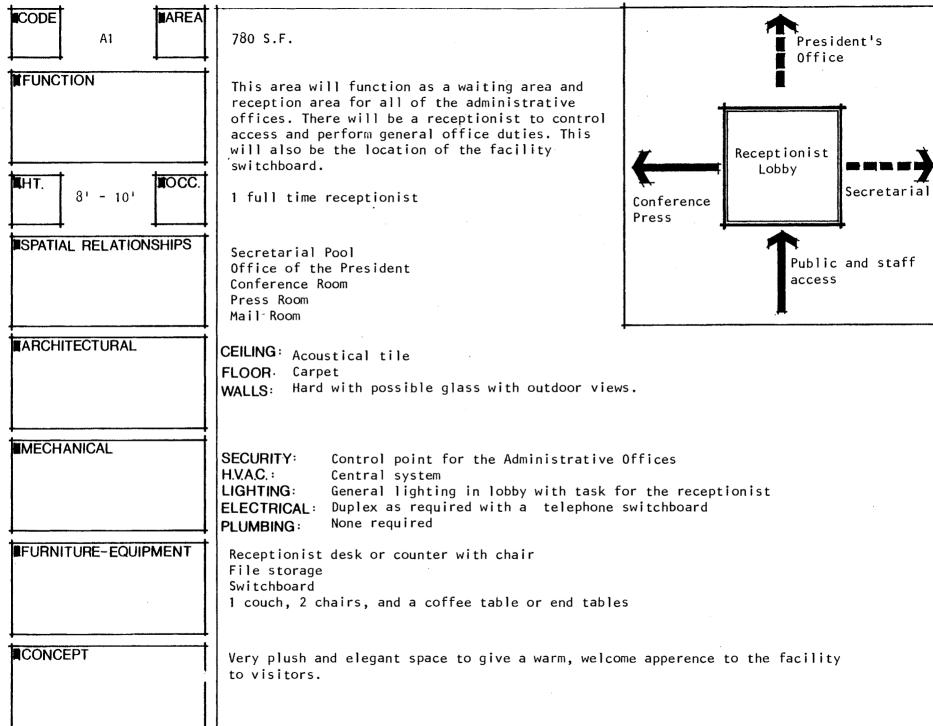
With a facility the size of Cherokee Downs, and with the large sums of money going through the complex, administration is very important. The Administrative Offices will function almost yearround with more intensive activity during the racing season. Some of the functions performed within the administrative offices include scheduling and calender planning for the following season, accounting of all income through ticket sales, concessions, bars, backstretch sales, purse fees, suite rental, and the printing of the track publication. The atmosphere created in the office should be of an executive nature and of very high quality materials to portray the proper image to those persons visiting the facility's Administration Offices.

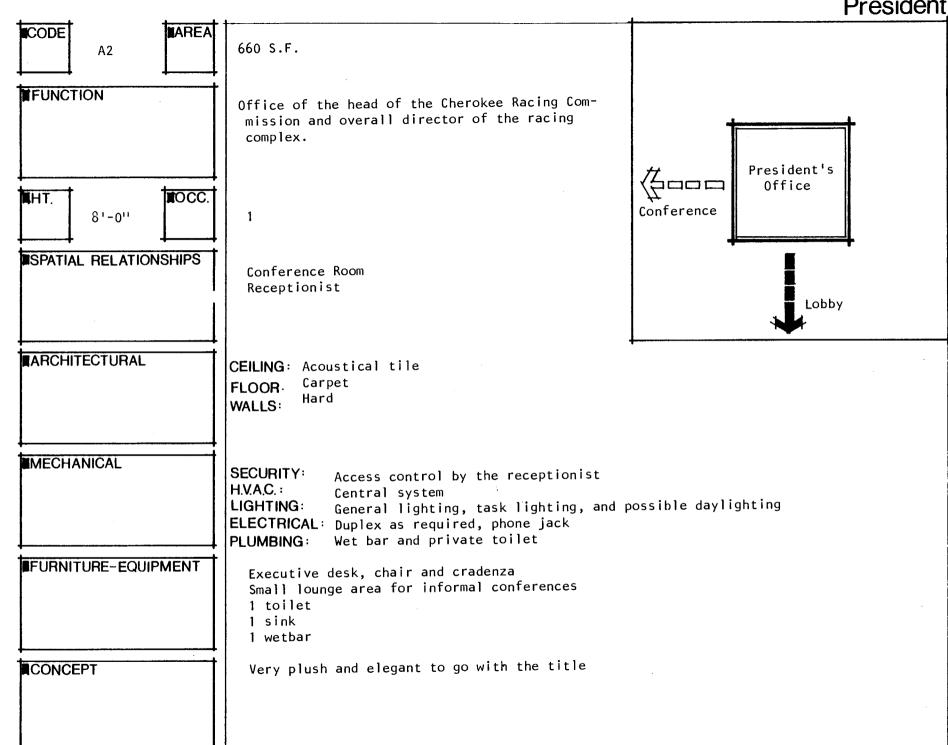


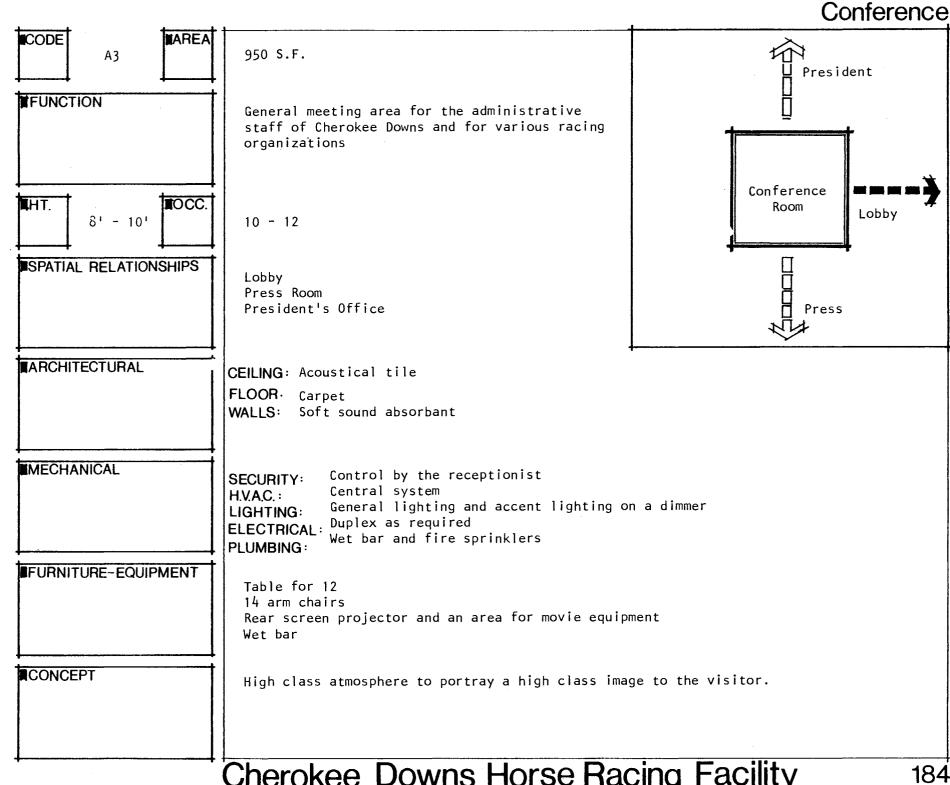
#### Space Requirements

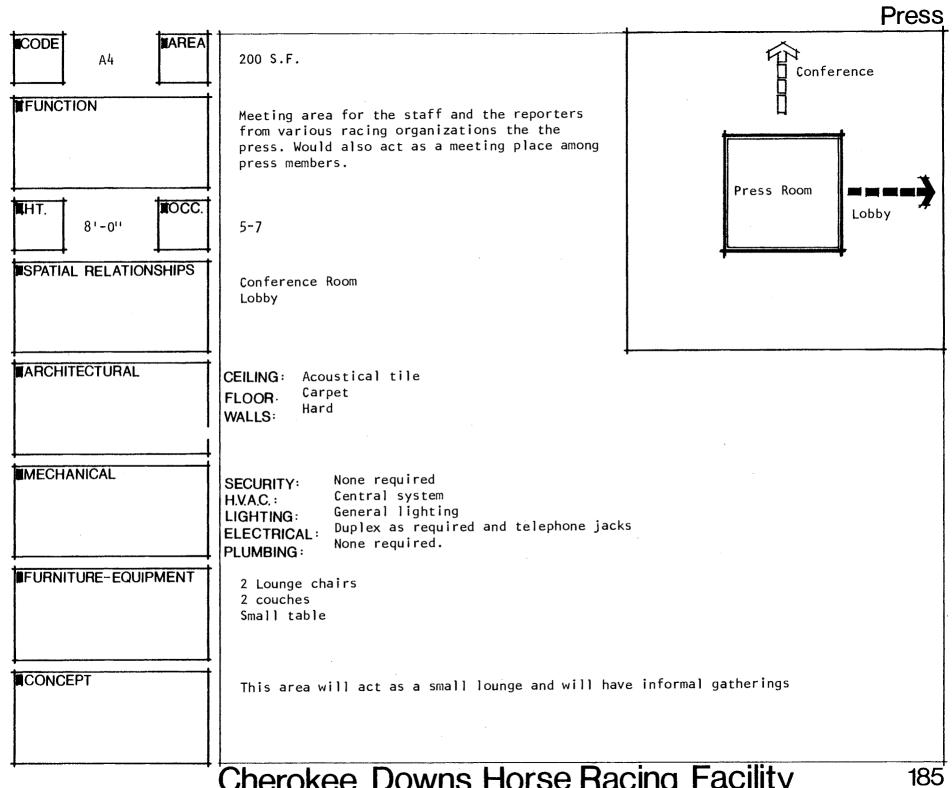
A1 A2 A3 A4 A5 A6 A7 A8 A9 A10 A11	Lobby and Reception area Presidents Office Conference Room Press Room Secretarial area Mail Room General Managers Office Assistant General Managers Office Accounting Department Directors Offices Computer Room Coffee Bar		780 S.F. 660 S.F. 950 S.F. 200 S.F. 135 S.F. 200 S.F. 150 S.F. 150 S.F. 150 S.F. 70 S.F.
	•		70 S.F. 300 S.F. 200 S.F.
	-	Total	6215 S.F.

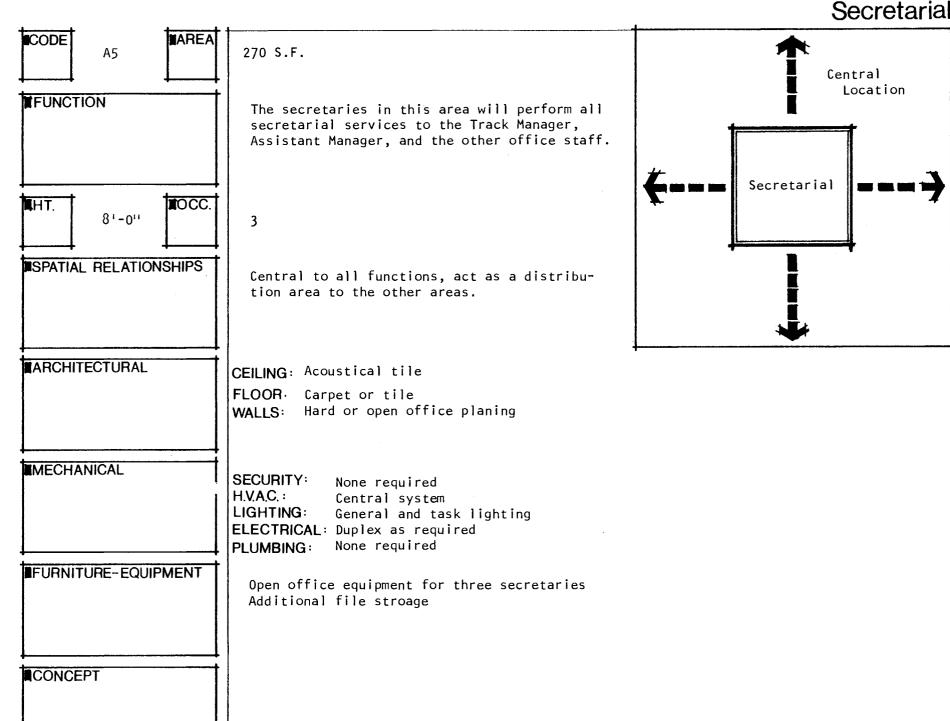




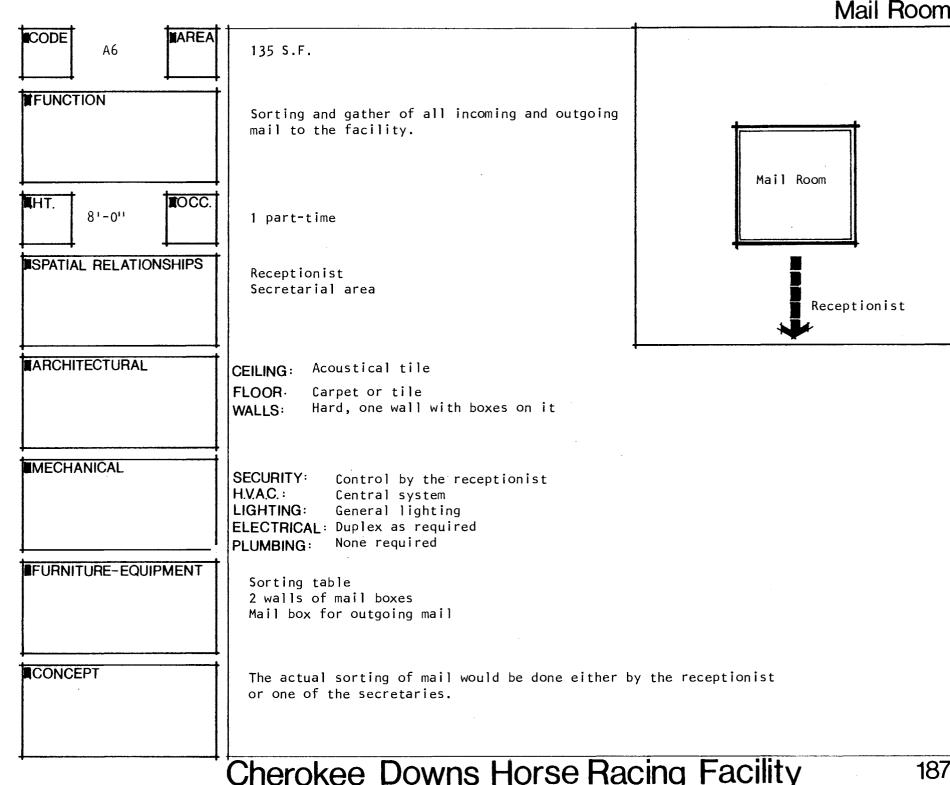


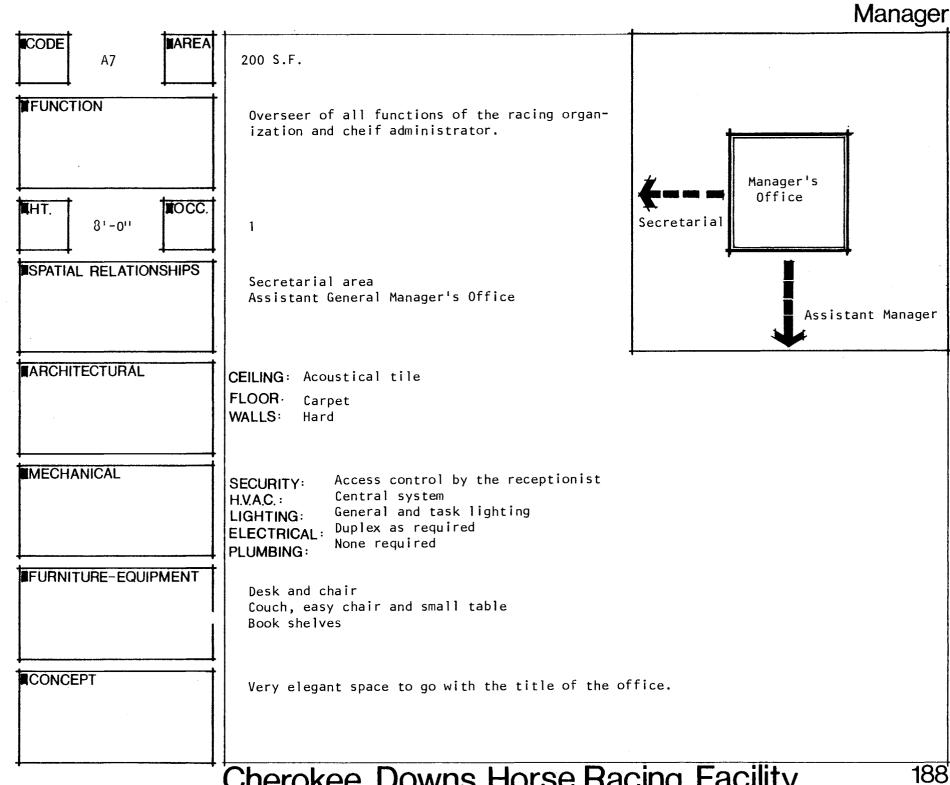


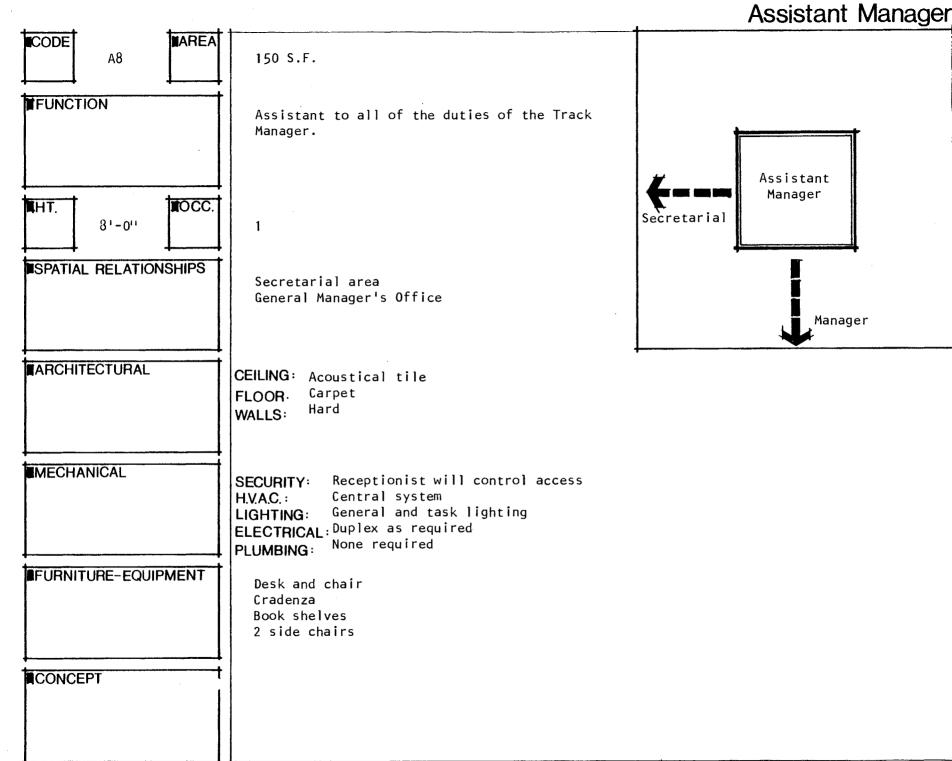


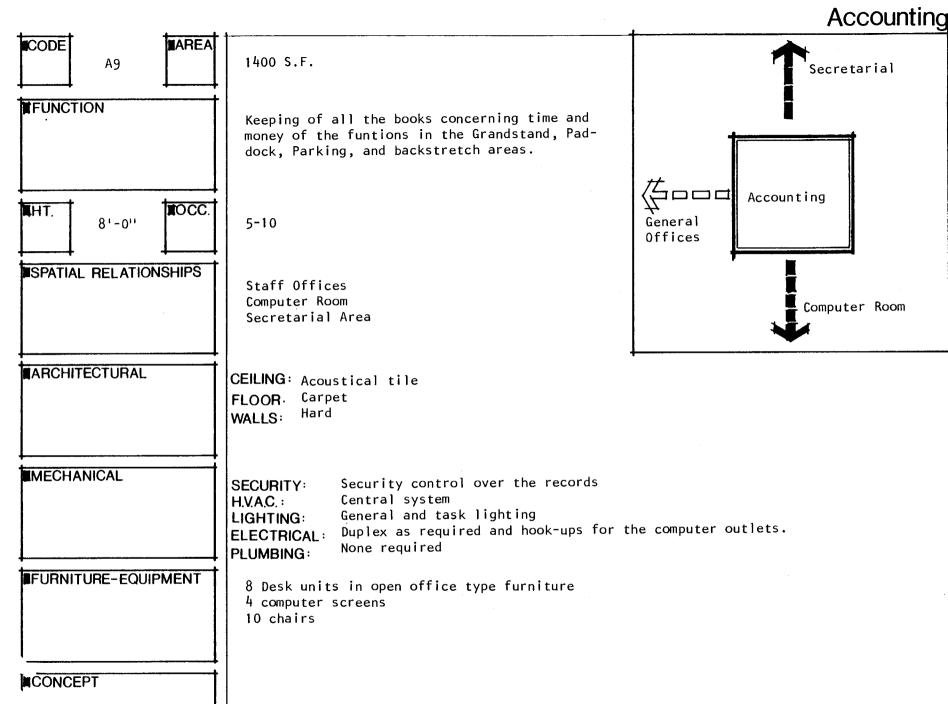


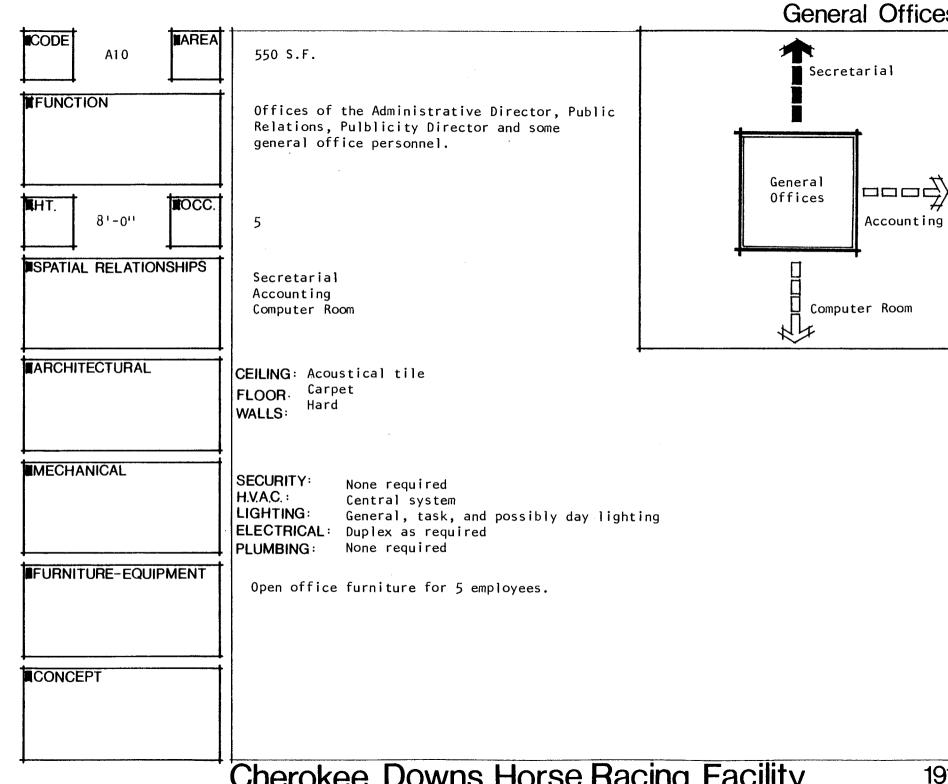
186

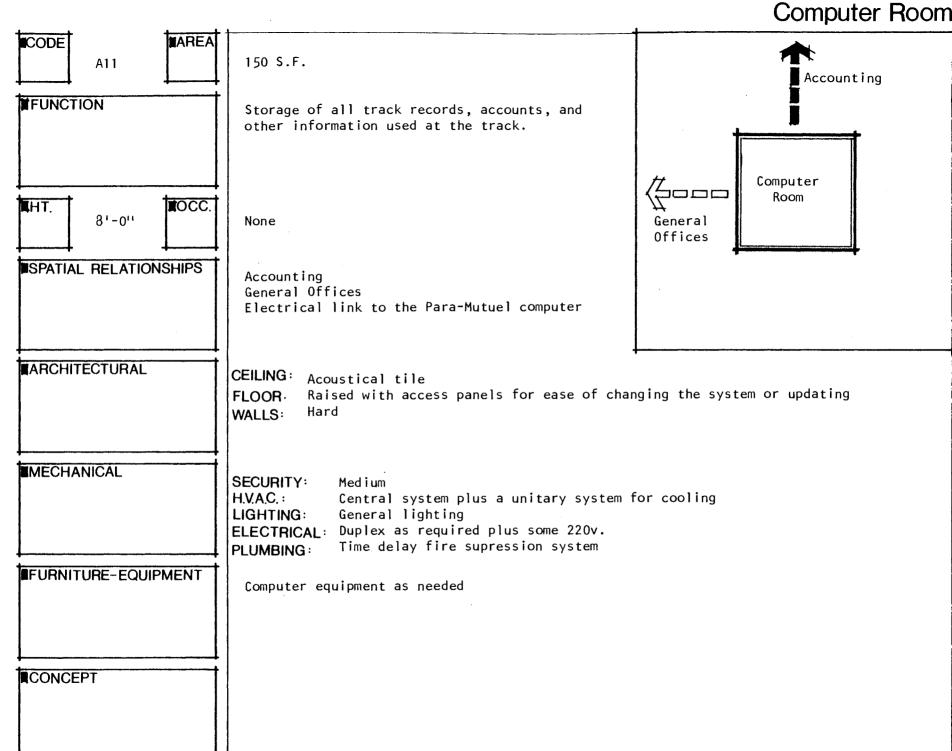


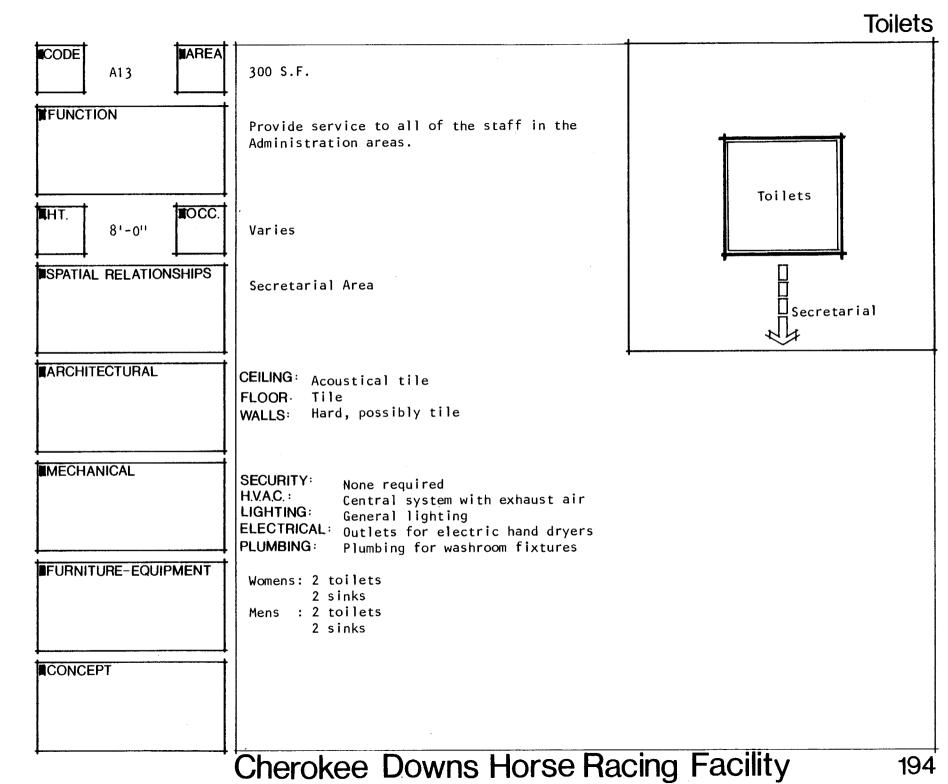


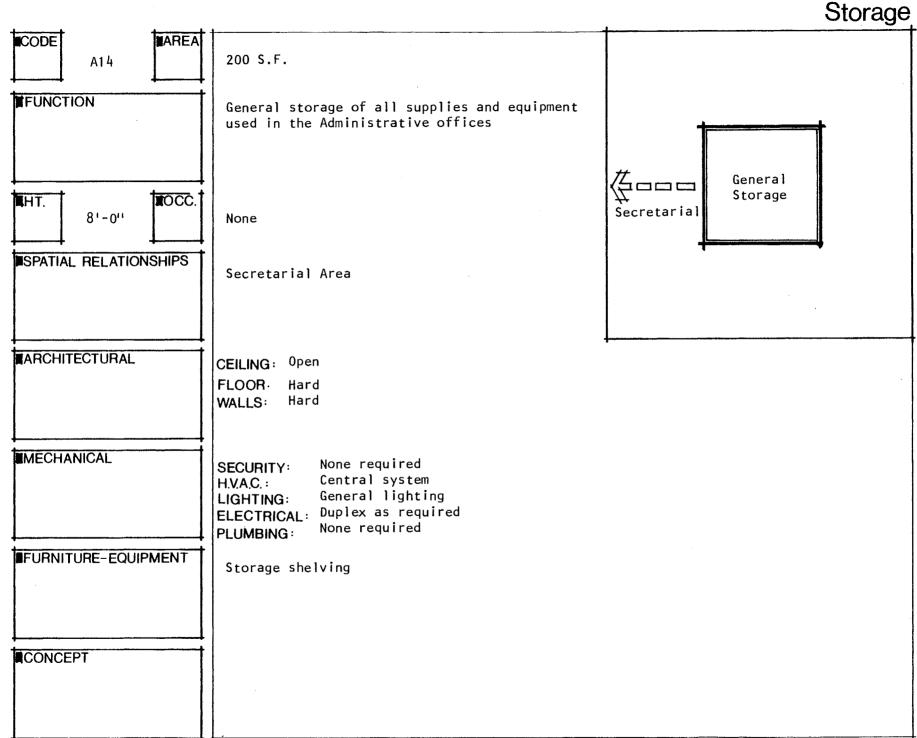




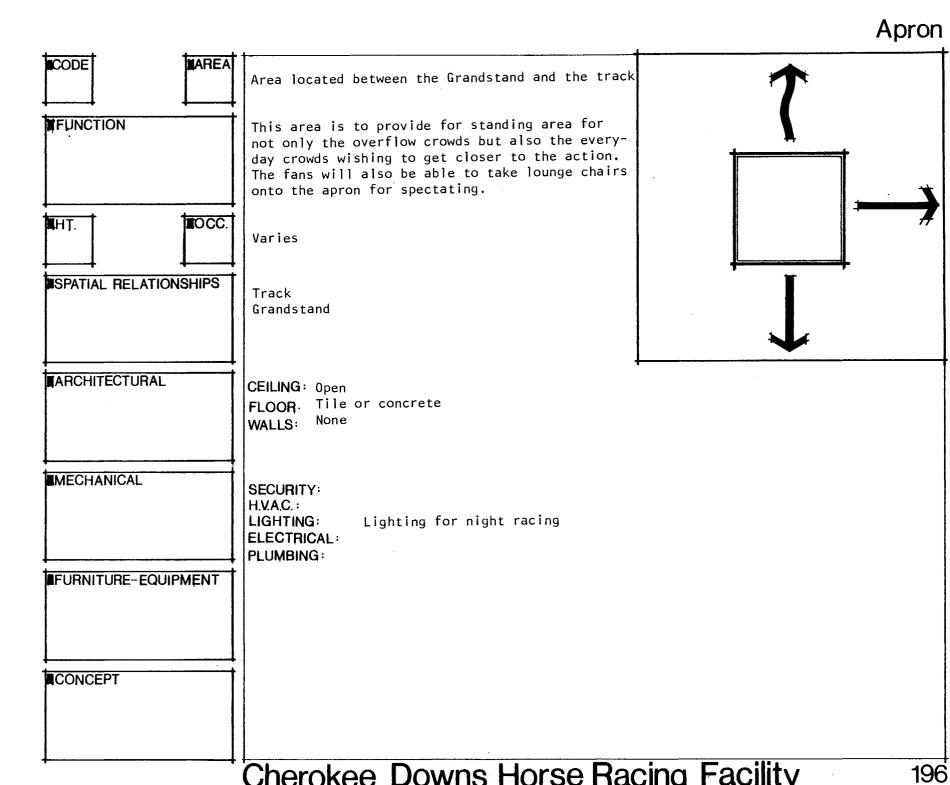




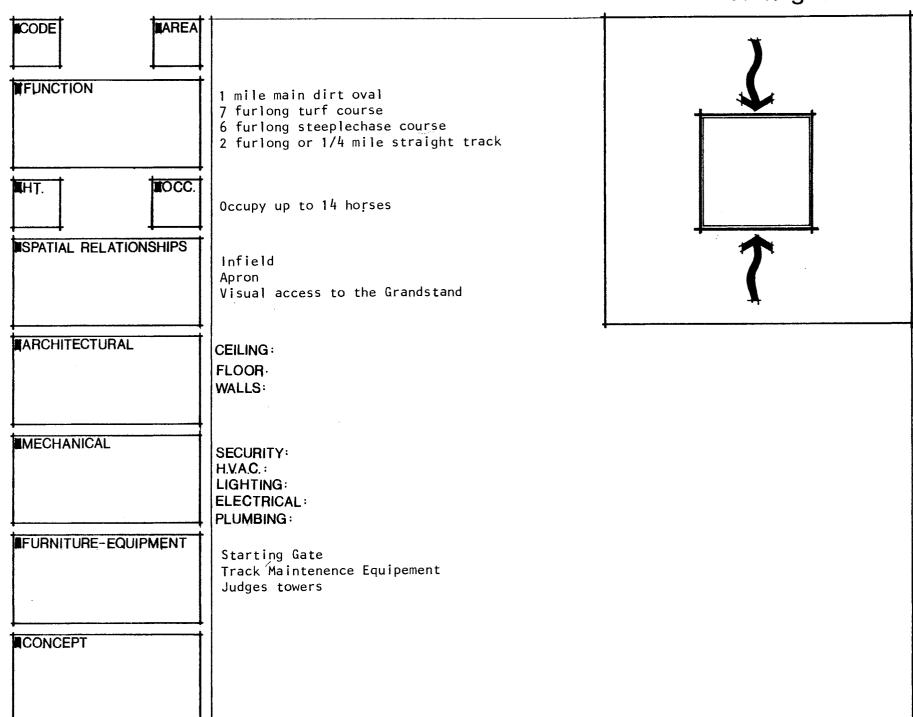


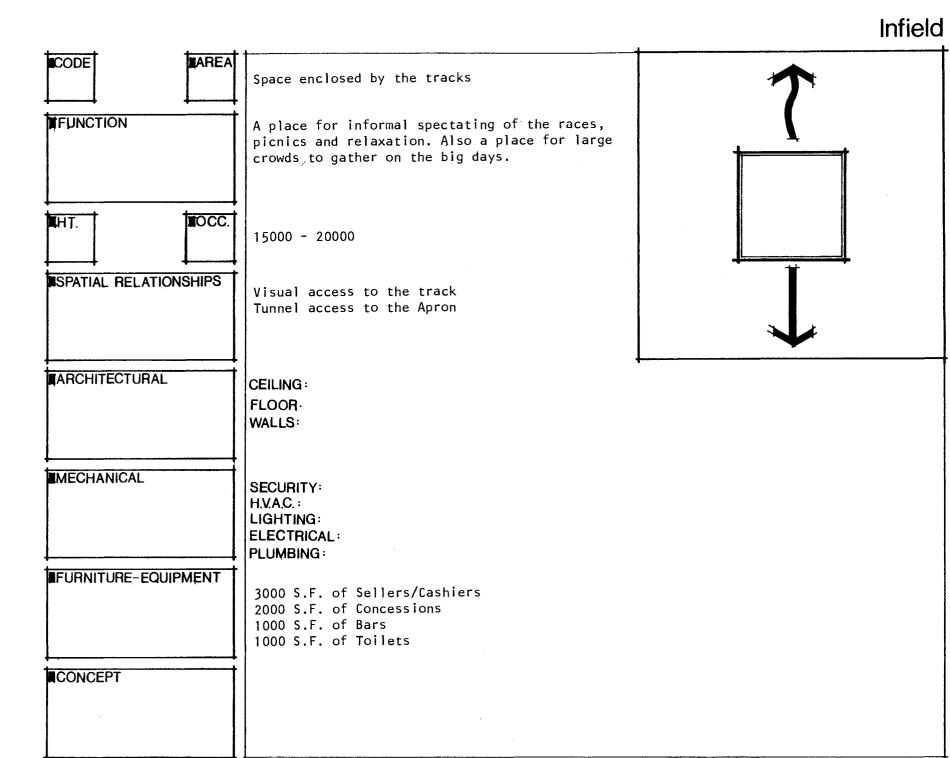


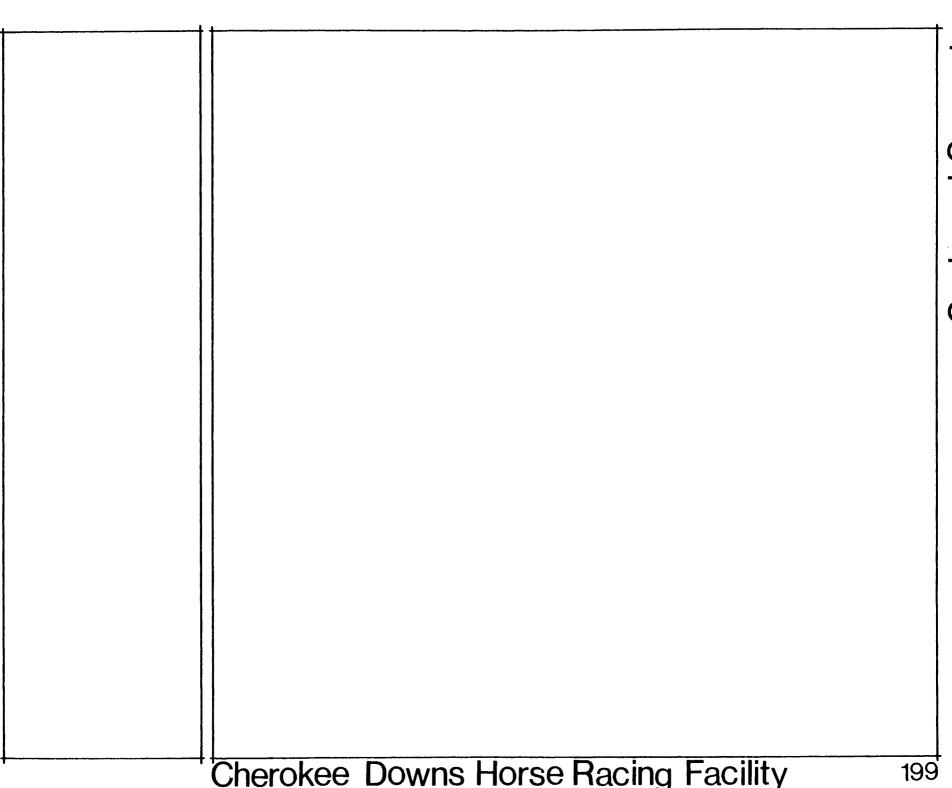
195



### Racing Surfaces







#### **≢** Form

Goal: Provide a sense of entry and an entry sequence.

Concept: The entry sequence should begin at Highway 51 and continue until the patron

arrives at the entry plaza.

Concept: Provide an obvious and enviting entrance on a grand scale to imply the

grandness of a race meet.

Concept: Make use of existing landscape and forms to direct the enty sequence.

#### 賞Form

Goal: To project an image that implies the nature of the sport and the sophistica-

tion of the facility.

Concept: The building should be of a grand scale in exterior appearence and in

the public halls.

Concept: Display the expensive and sophisticated totalistor equipment because of the

cost similar to the way a bank displays the bank.

Concept: Use high quality materials to portray a high visual image.

Concept: Use ideas and images from the past and intermix them with the state of the

art technology.

#### **Economy**

Goal: Provide for income producing activities to help support the facility.

dour. Trovide for income producing decivities to herp support the facility.

Concept: Flexible tracks to allow for many types of races on 4 - 6 days a week almost

Concept: Facilities to accommodate year-round use of the stables and training facilities.

year-round.

Concept: The selling of feed and tack in the Backstretch area.

#### **Economy**

Goal: Reduction of operation and maintenence costs.

Concept: Make use of both passive and active solar systems.

Concept: Select surfaces that are easy to maintain in the public areas.

#### **其**Time

Goal: Provide for expansion.

Concept: Allow for certain facilities to expand over time as the crowds enlarge.

#### Function

Goal: To provide a major horse racing facility for the state of Oklahoma and the region.

Concept: A high class facility to display the horses in their finest state.

Concept: The facility should incorporate the newest technology and become the

state of the art facility.

Concept: Provide comfort and an attractive environment for the race goer.

#### Function

Goal: To provide a facility that can accommodate up to three times the seating capacity.

Concept: The facility should include additional seating areas in the Paddock and circulation halls, plus the allowence of large masses of people on the

infield and the apron.

#### Function

Goal: Provide for various levels of security.

Concept: Very high security in the para-mutuel system with a secure circulation system.

Concept: Restricted security access to the Backstretch area to assure the safety of the horses.

Concept: Restricted access to certain levels in the Grandstand.

#### Function

Goal: The faciltiy must include spaces for very large groups but also for indiviuals.

Concept: The large halls provide for chance meetings while the smaller lounges and clubs provide for planned meetings.

#### Function

Goal: Flexibility of racing surfaces.

Concept: Provide racing surfaces for a wide range of race lengths ranging from 2 to

12 furlongs.

#### Form

Goal: Preserve the existing site conditions and views.

Concept: Make use of existing land forms, trees, and views by using existing trees and

contours to the advantage of the facility. (terrace parking)

Concept: Situate the Grandstand to take advantage of the distant lake view.

#### Economy

Phasing of a project such as this is nearly impossible. The Grandstand, Track, and Parking is a single phase proposal and must be built as a whole. The only facilities possible to phase would be the number of stalls in the Backstretch area and not building the horse hospital in the first phase. But, for a first class facility from opening day, I see a large sum of money necessary for construction of the entire project. By racing almost year-round and keeping the Backstretch open year-round as a training facility, I feel that building the entire project will pay for it's self more quickly.

#### Time

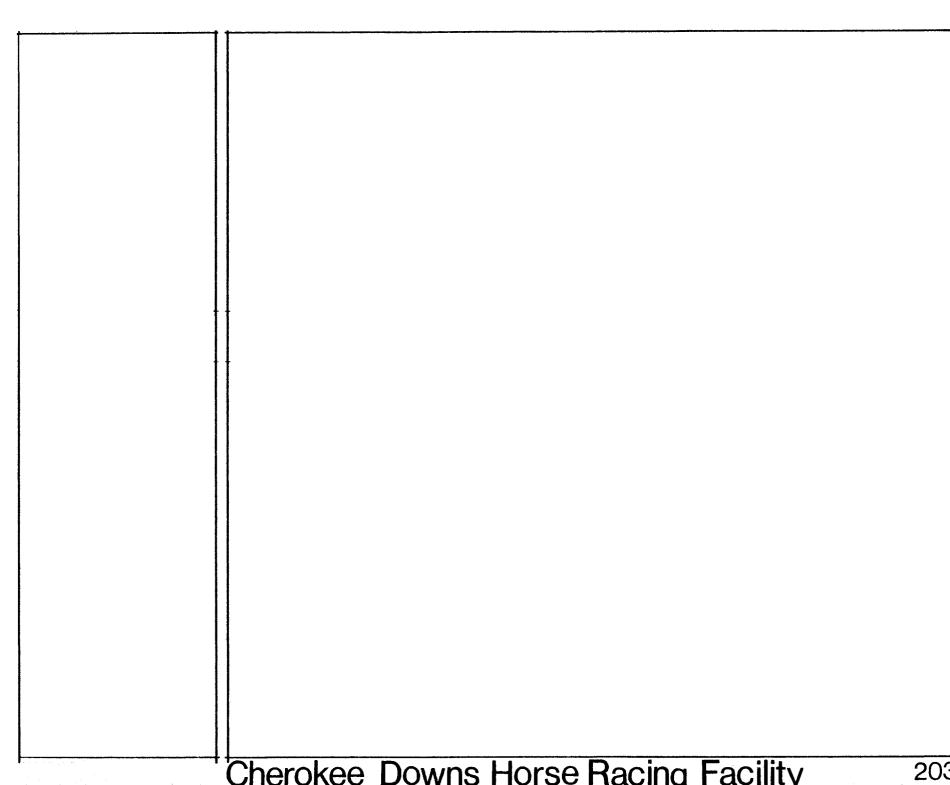
As far as the facilities that will need to be looked at as far as growth and decline, I see almost the entire complex being in the growth range. The only area I could see with a possible decline, is the Para-Mutuel Sellers/Cashiers, with the state of the art computerized totalisator systems, the sellers/cashiers could some day be obsolete. The growth of the other facilities depends on the acceptance of horse racing in the state, which is feel will be very high. Therefore, the Grandstand could possibly expand from 12000 to 15000 seating capacity and beyond by adding additional bays which would allow the support areas and parking to increase also. Furthermore, the stable expansion has been programed to expand from 1200 stalls to 1500 stalls.

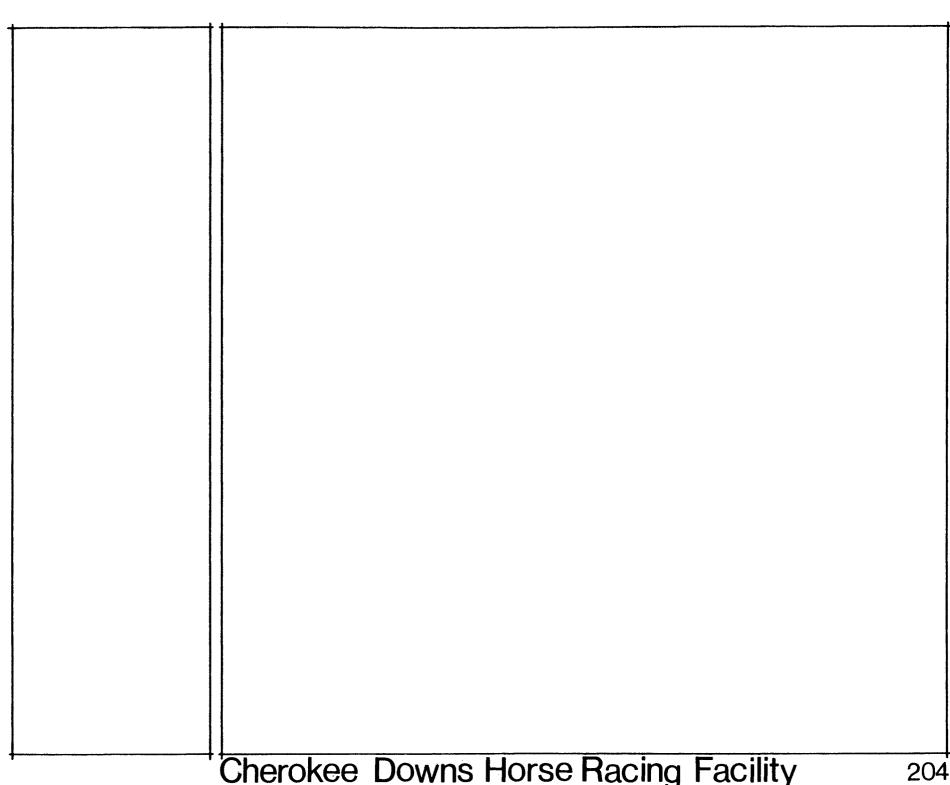
#### Visual Image

The visual image of the site now is natural with no existing structures on or near the site to relate to. Therefore, the image of the facility will be within itself. I feel that the image of the Backstretch area should be low key and blend in well with the existing trees and nature of the site. The Grandstand should be an image in itself, something that grows out of the natural site. Something to be seen from both the lake and the Highway. The parking areas should be terraced to take advantage of the sloping site and to save as many trees as possible.

#### Buildable Area

The only restrictions on the buildable area on the site are the flood level and the 25' setback along the railroad track. Other than these minor restrictions, the site is open to any development. The logical hierarchy on the site would be the parking closest to Highway 51 with the Grandstand located near the center of the site facing Northeast, and the Backstretch located on the North end to take the greatest advantge of the breezes of the lake. The Grandstand should be orientated so that direct late afternoon sunlight does not enter the viewing side of the Grandstand or produce unwanted glare when viewing the track.





### SARATOGA SPRINGS

#### FACILITY STATISTICS

Acreage

: 350

Tracks

: 1 1/8 mile dirt oval

1 mile inner turf

7 furlong inner turf steeplechase with six jumps

1 mile training track (Oklahoma)

1/2 mile training track in the Backstretch

Parking Capacity : 5000 Automobiles

Largest Crowd Average Crowd

Seating Capacity: 8865 in reserved seating : 42357 at the 1982 Travers

: 25125 during the 1982 season of 27 race days

INFORMATION BASED ON A VISIT TO SARATOGA SPRINGS ON AUGUST 6, 1983.

Saratoga is the oldest racing facility in the United States, founded in 1864. The racing facility is located in the resort area of Saratoga Springs in Eastern New York state and the track is operational only during the peak tourist season at the Saratoga Spas which is the month of August. Saratoga is a beautiful facility with much tradition. The Grandstand is a wood structure with a roof covering the seating areas and is traditional in design in that it is stretched out along the stretch due to many expansion additions through the years. The Grandstand is made of one sloping level from the Apron to the General Public Hall with the Entrance Hall located under the seating areas on grade level. The Clubhouse is located at one end of the structure and is nearest the finish line. The Paddock is located behind the Grandstand and is easily accessable from most public areas. The saddling is done in an open area with each horse having an oval walking area around some trees. There are also saddling stalls covered with colorful canvas for protection from the elements. Also in the paddock area are outdoor dining areas under open air tents to provide views of the parade ring. Wagering windows are located in the Paddock area, Entrance Hall, General Public Hall, Clubhouse, and the infield. The Backstretch area is very picturesque with the old wooden stable barns intermixed among the trees. The following is a list of evaluations I have made concerning the racing facility at Saratoga Springs, New York. The conclusions drawn are based on people I have spoken with associated with horse racing, Santa Anita Park in Arcadia, California, Louisiana Downs in Bossier City, Louisiana, and knowledge I have obtained from being a student of Architecture.

#### GOOD POINTS

Natural shade and green areas in the backstretch area.

No horse - car interaction point from the backstretch to the paddock or track. Large apron for viewing track.

Easy access to the paddock areas and support facilities.

Loose layout of the support facilities in separate low scale buildings.

Stables have covered walking areas around the perimeter.

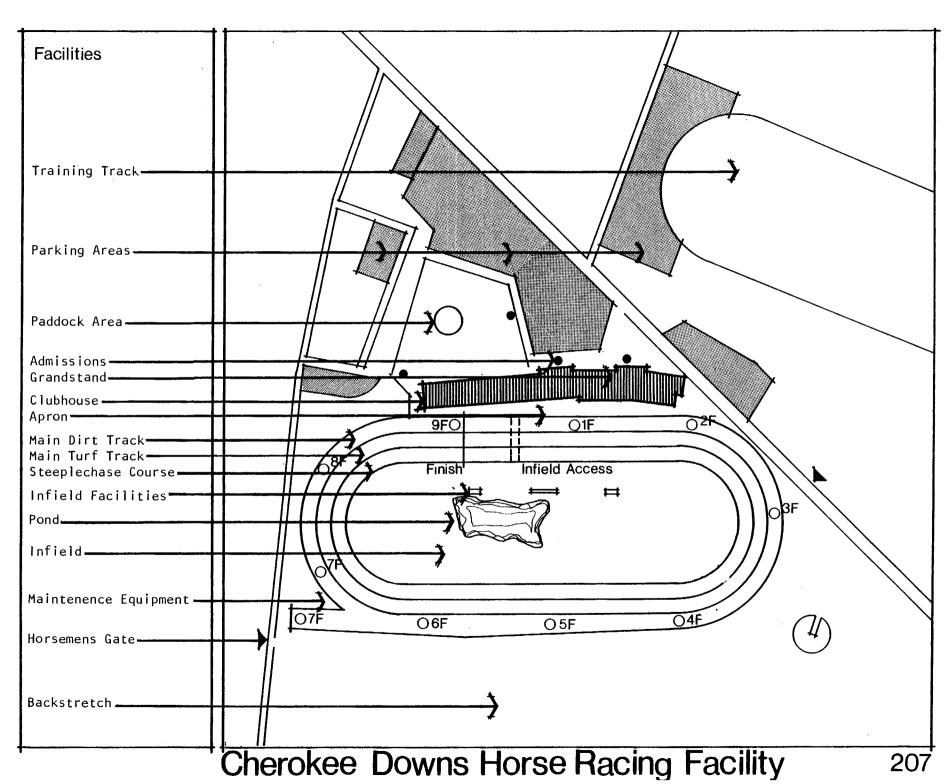
Adjoining Harness racing track.

Practice track separate from the main track.

#### BAD POINTS

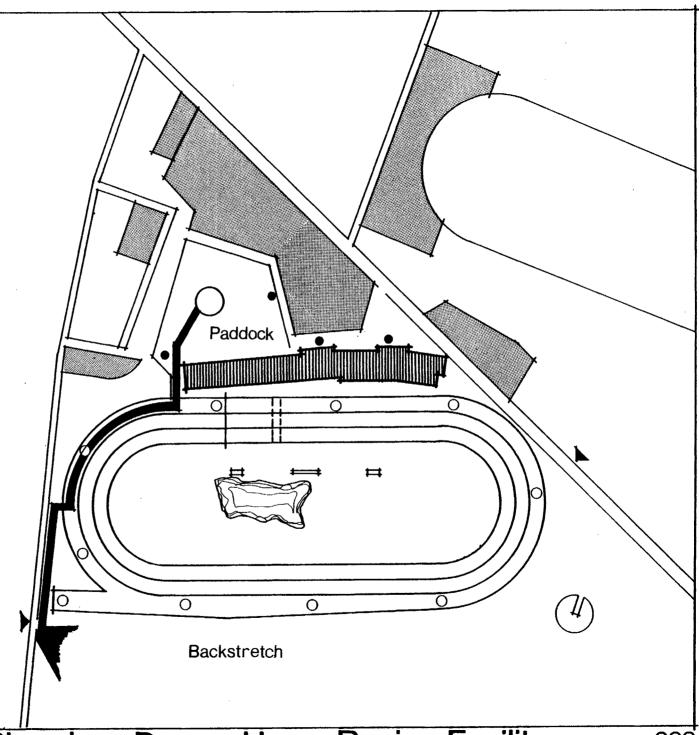
Long walk from the backstretch to the paddock and the horses must walk on the track. No tunnel for free movement to the infield, must cross wood platform before the race. Lack of facilities on the infield.

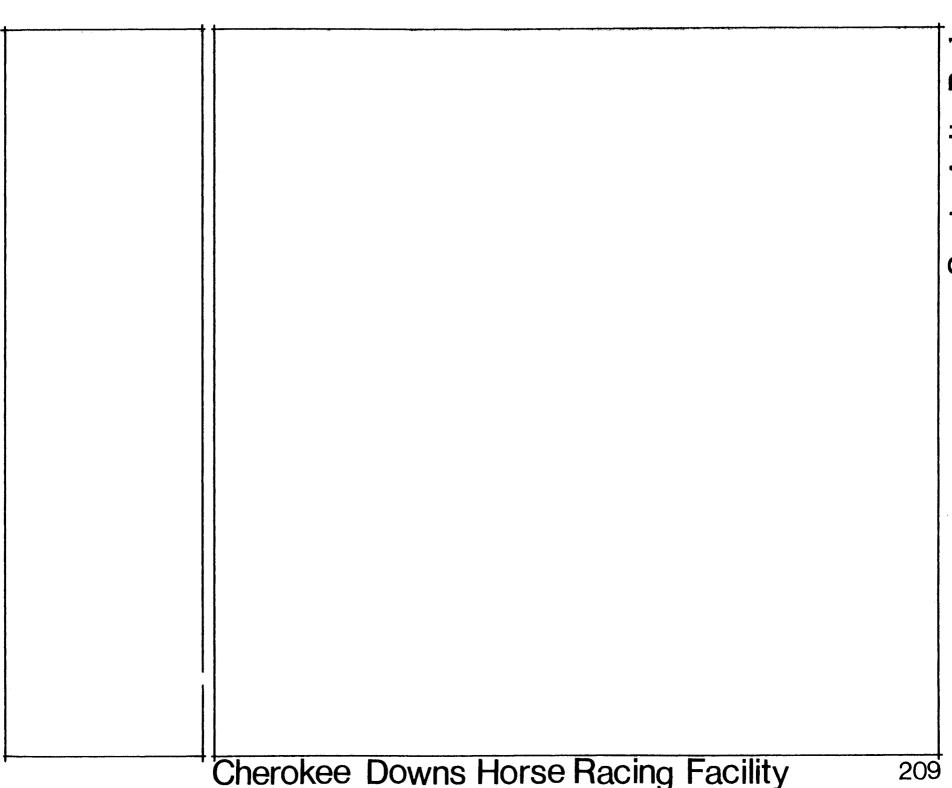
Lack of imediate parking facilities, must use the Harness track as an overflow. Practice track very remote from the backstretch and the horses must cross a street. Grandstand is facing almost directly South.



#### Horse Circulation

The horse circulation from the Backstretch to the Paddock is not the most economical. For instance, some horses at the far East end of the stables might have to walk up to 1 mile just to reach the Paddock area. Once the horses get to the Southwest corner, there is a pleasent tree lined walk to the middle of the first turn. Then the horses must walk on the main racing surface to the Paddock area and then cross over the walkway leading from the main admissions gate. Therefore, the horse circulation is not the best example and if the backstretch was located closer to the Paddock, most of these problems would be eliminated.





### SANTA ANITA PARK

FACILITY STATISTICS

Acreage : 323 acres Stable Capacity : 1744 horses

Tracks : 1 mile dirt oval

1 3/4 mile downhill turf course
7 furlong oval inner turf course
6 furlong oval inner training track

Parking Capacity: 22000 plus overflow areas with shuttle service

Seating Capacity: 22000 Opening Day: 68000

Average Crowd : 32000, largest in the United States

INFORMATION IS BASED ON A VISIT TO SANTA ANITA AND AN INTERVIEW WITH AUTHUR HERSHEY ON AUGUST 16, 1983.

Santa Anita was opened in 1934 and is in the architectural style of the Art Deco period. The facility is very large, with beautiful grounds, and a nice backdrop in the San Gabriel Mountains. The Paddock area is located behind the Grandstand next to the main admissions gate and is layed out in a formal gardens with flowers, fountains, and benches for public enjoyment. Just off of the Intrance Hall there is a display of Clydsdale horses and equipment provided by Budwiser to pull the starting gate around the track to various chute lengths rather than the use of a tractor, nice idea. Horses enter the track between the Grandstand and the Clubhouse and the top five finishers exit this way through the Paddock area while the other horses go directly to the Backstretch. The Grandstand is roofed and open air, and similar to Saratoga Springs, stretches along the stretch on in one sloping level from the Apron to the General Public Hall. The Clubhouse is one the East end an is organized on four levels of different quality seating types. Similar again to Saratoga Springs, Santa Anita has been built in sections as the need for expansion was needed. As an interesting note, Santa Anita has been selected as the site for the equestrian events of the 1984 Olympic Games.

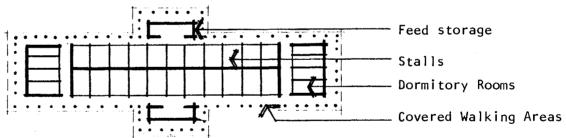
### General Information on Santa Anita Park

Racing facilities are broken down into 4 basic divisions:

- 1. Stables
- 2. Parking
- 3. Grandstand
- 4. Racing Surfaces

#### 1. STABLES OR BACKSTRETCH

- A. Barns
  - 1. 30 40 stalls per barn
  - 2. minimum of 2 tack rooms per barn
  - 3. 2 feed rooms per barn
  - 4. 4-5 rooms at the end or above each barn
  - 5. Showers and toilets at each barn
  - 6. During the season, approximately 1 person per horse minimum

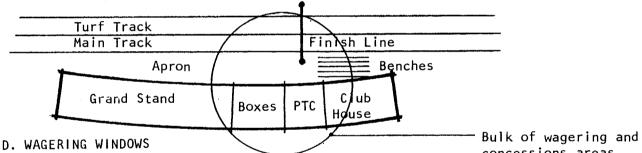


### 2. PARKING

- A. Attendance determines parking needs
  - 1. 1 space for every 2 1/2 persons
- B. Most facilities have general, preferred, and valet parking
  - 1. Must provide for nearby overflow parking at areas such as public parks, churches, and schools with a shuttle service to deliver the people.

### 3. GRANDSTAND

- A. Total Reserved Seating 20000
  - 1. Reserved General Admission 11000 public, 1 level
  - 2. Clubhouse 4000 public, 2 levels
  - 3. Boxes 3000 preferred, 4-8 seats per box, 2 levels
  - 4. Private Turf Club 2000 private, 4 levels
- B. Additional Seating areas
  - 1. Apron, for standing or use with lawn chairs
  - 2. Infield, standing or benches
  - 3. Restaurants
  - 4. Paddock Area, benches and standing
- C. If daily attendance is 20000, there will be approximately 10000 seated in the Grandstand at one point and 10000 elsewhere.



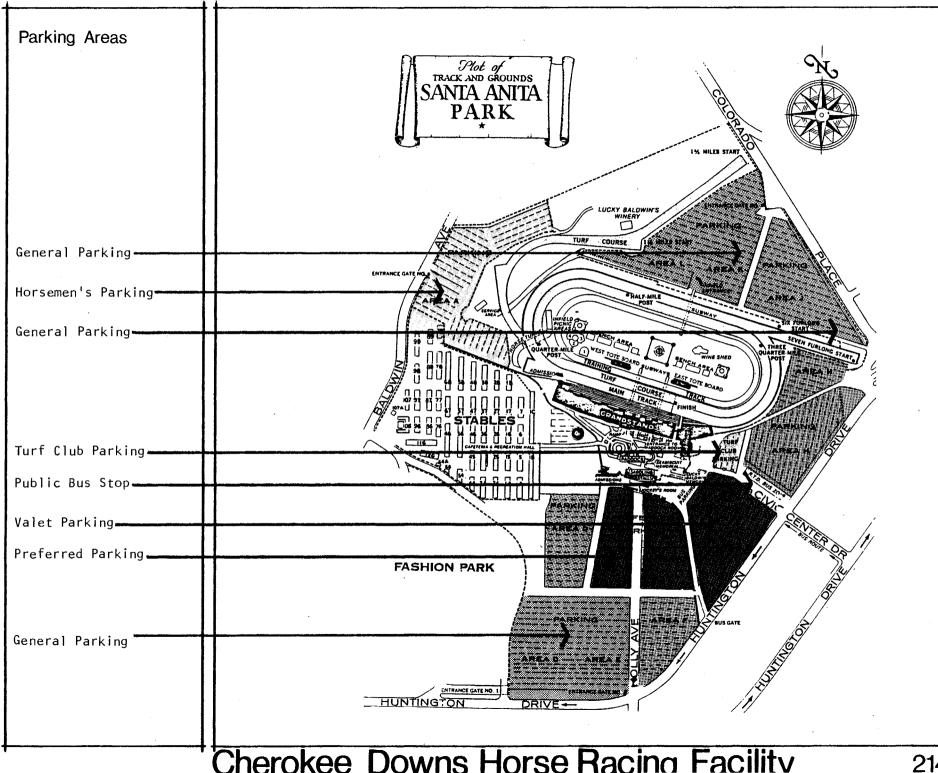
1. Based on the normal biggest crowd

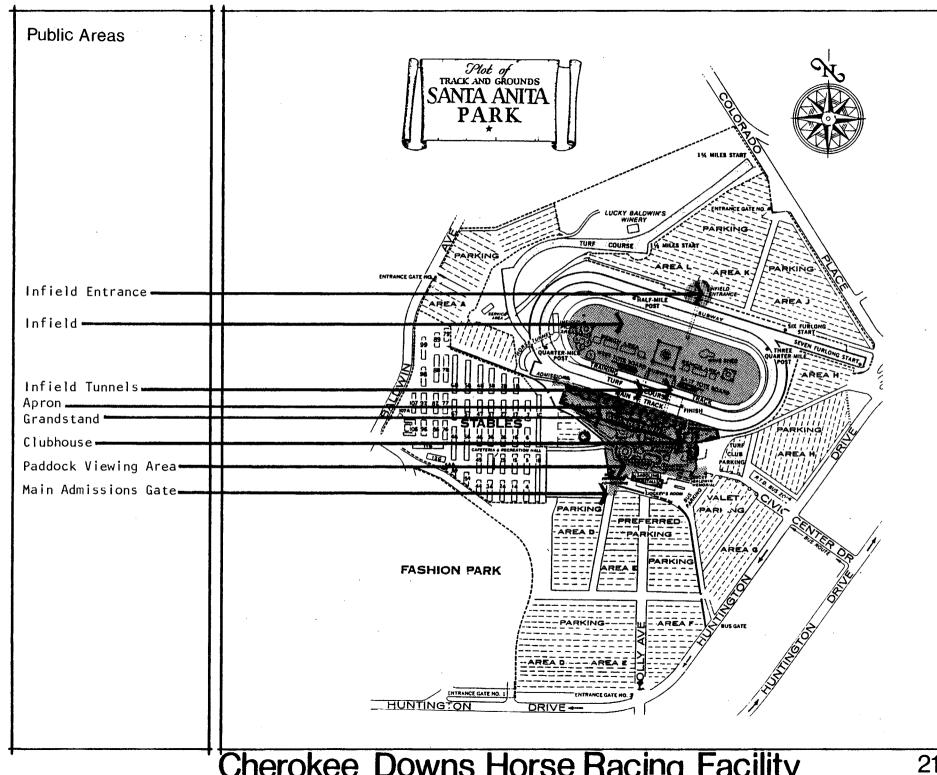
concessions areas.

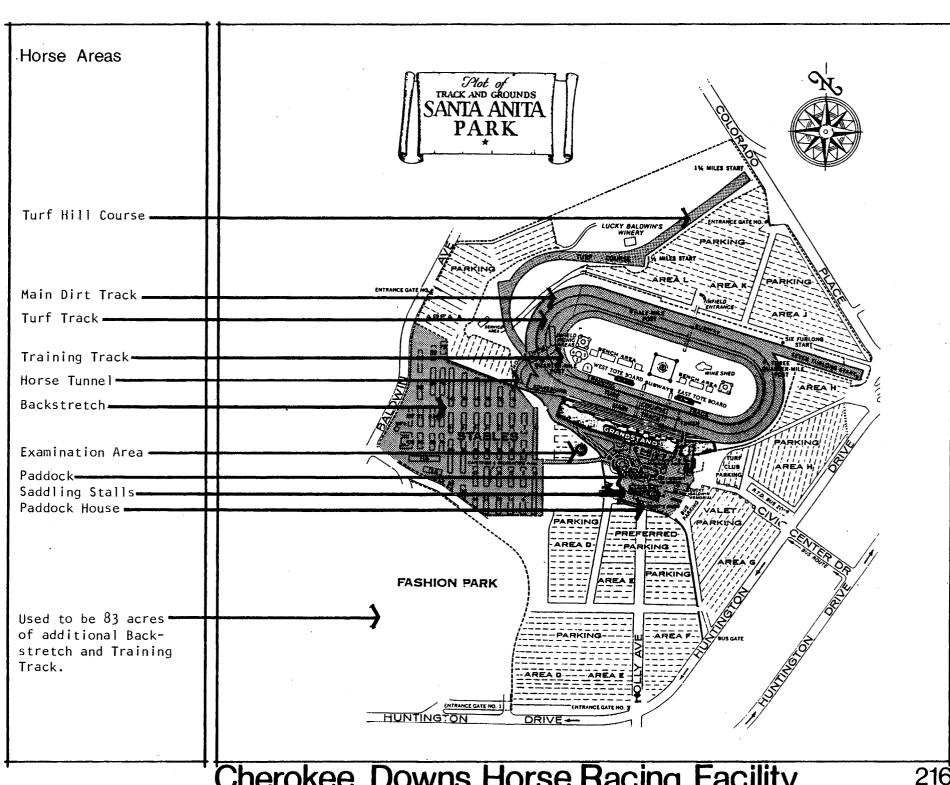
- 2. Santa Anita has 800 wagering windows with 725 clerks on big days
- 3. 32000 average attendance, 55000 is the normal biggest
- 4. 1 window per 69 people on the normal biggest 1 window per 40 people based on average attendance.
- E. FOOD CONCESSIONS AND BEER
- F. REST ROOMS
- G. SEPARATE LIQUOR BARS
- H. PUBLIC SPACES AND HALLS
  - 1. No excessive pillars under the Grandstand to keep openess and views
  - 2. T.V. Monitors
  - 3. Tote odds boards
  - 4. Program sales and gift kiosks

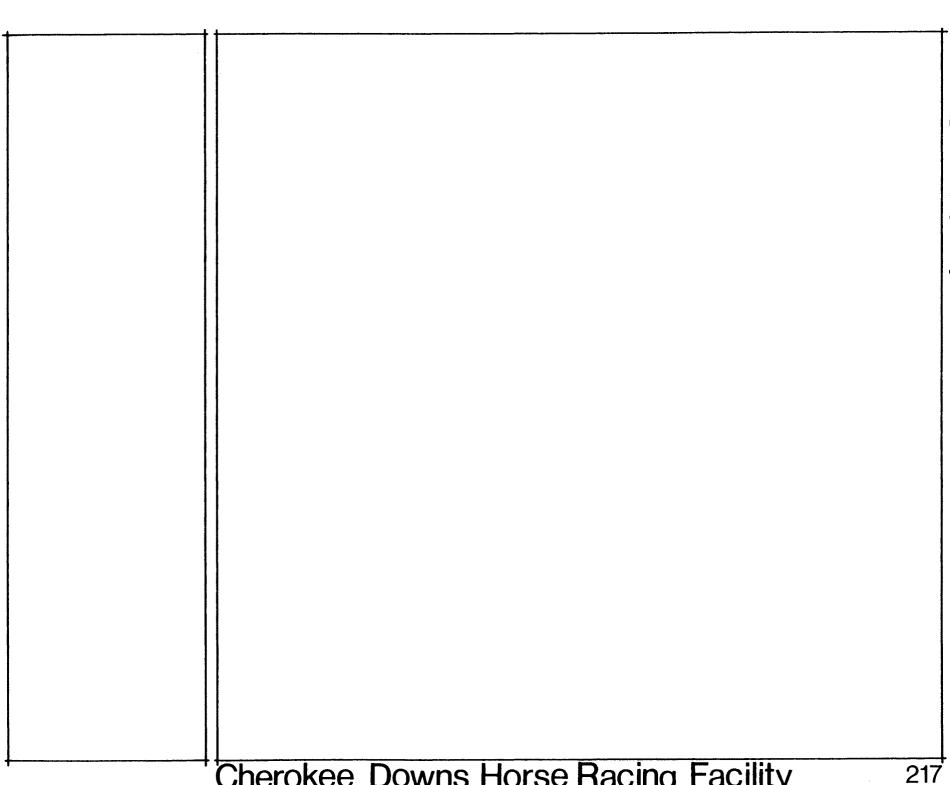
### 4. RACING SURFACES

- A. 1 mile dirt oval main track
  - 1. Approximately 3/16 of a mile or 1000' stretch
  - 2. 80'-0" wide on the stretch
- B. 1 3/4 mile downhill turf course
  - 1. modeled after a European tradition for horse racing.
  - 2. The last 7 furlongs of the turf course are oval and located inside the main dirt track.
- C. 3/4 mile hard pack training track
  - 1. Located inside the turf oval enclosing the infield
  - 2. Used to be located in the area shown on the plan as Fashion Park.
  - 3. Authur Hershey strongly recommended not having the training track in this area due to the conflicts that might occur and visually it would be nicer if it was located in aother location, preferably closer to the backstretch.









## LOUISIANA DOWNS

FACILITY STATISTICS

Acreage : 280

Tracks : 1 mile dirt oval

7 furlong turf

Parking Capacity: 10000 autos

Seating Capacity: 10250 in the Grandstand

5000 in the Bleechers

Average Crowd : 11303

Opening Day : October 1974

Season Length : 125 days

Louisiana Downs is located in Bosier City, Louisana on a 230 acre plot bounded by three highways. The complex includes a 10 fulong track, stadium, paddock house, backstretch, and parking for 10000 autos. The stadium is made up of 8 levels with a seating capacity of 10250 and a total standing room capacity of nearly 30000. The facility is fully air-conditioned and contains 3 public levels, Penthouse Suite level, 2 level pressbox, and intermediate levels containing the Administration area, Boxcar, and a fully equiped kitchen. The Grandstand size is deceiving with the overall height of approximately 10 stories, and the overall length of 500'. The building module is 16' and is based on the Clubhouse Boxes with the major strructural members being 32'-0" on center.

Good Points

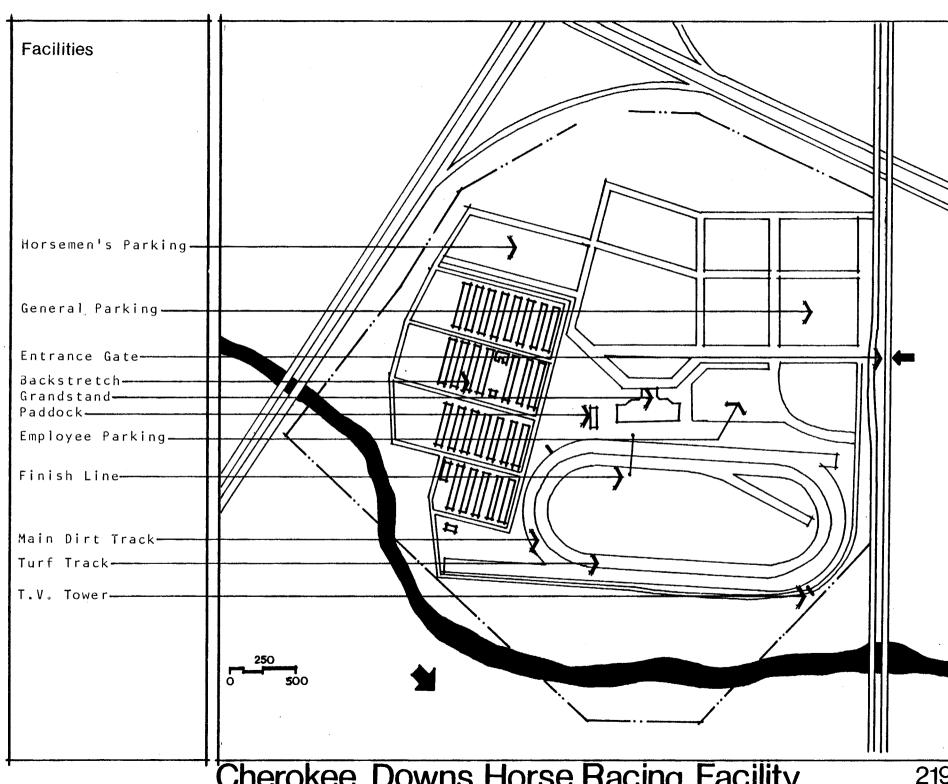
Fully Air-conditioned

No columns to obstruct the view of the track form the seating area.

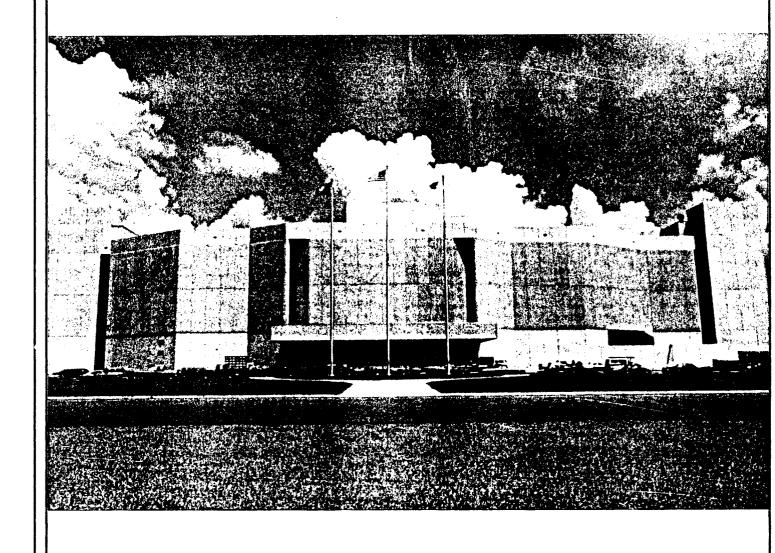
Penthouse suites (first facility to offer privately owned suites.

Jockey Club

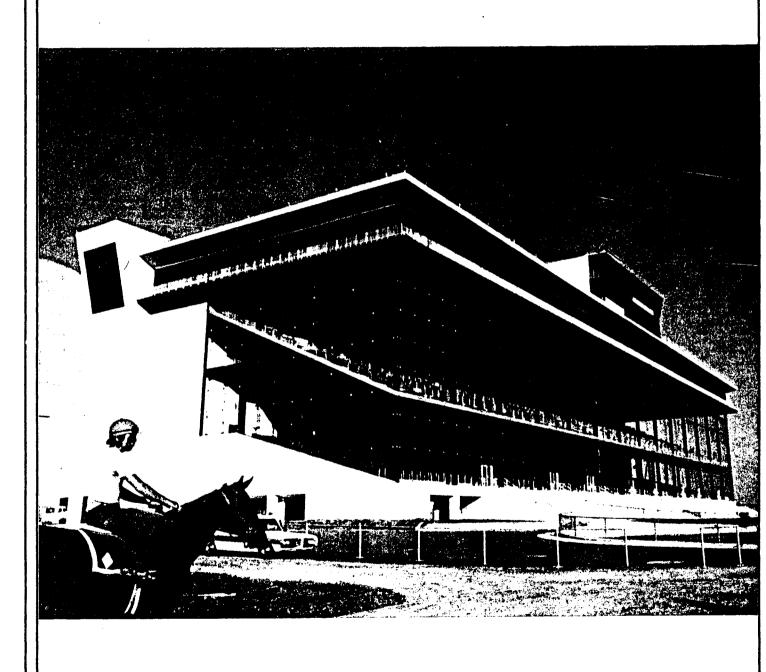
Roof garden entry to the Administrative offices.



Entry Facade



View from Track



Cherokee Downs Horse Racing Facility

Table Seating

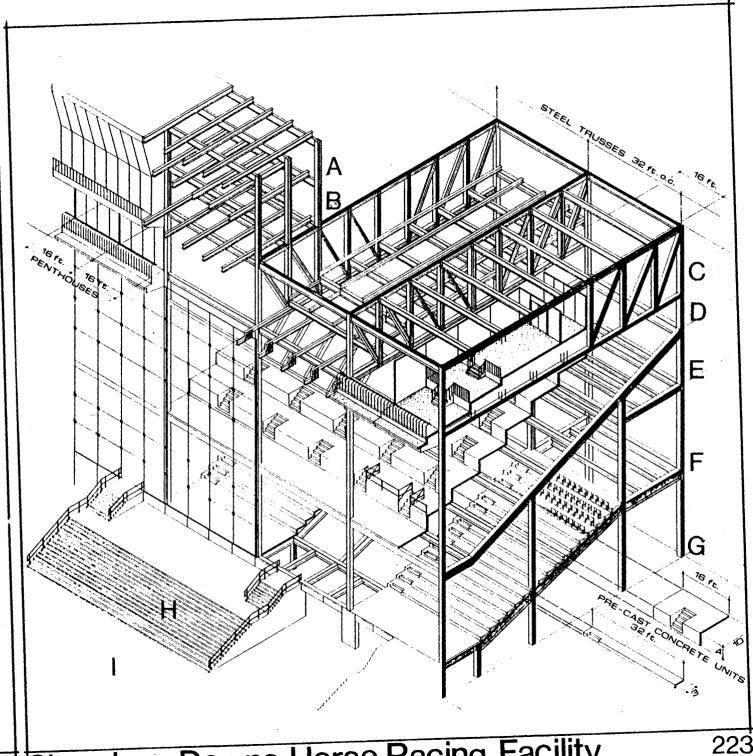
Cherokee Downs Horse Racing Facility

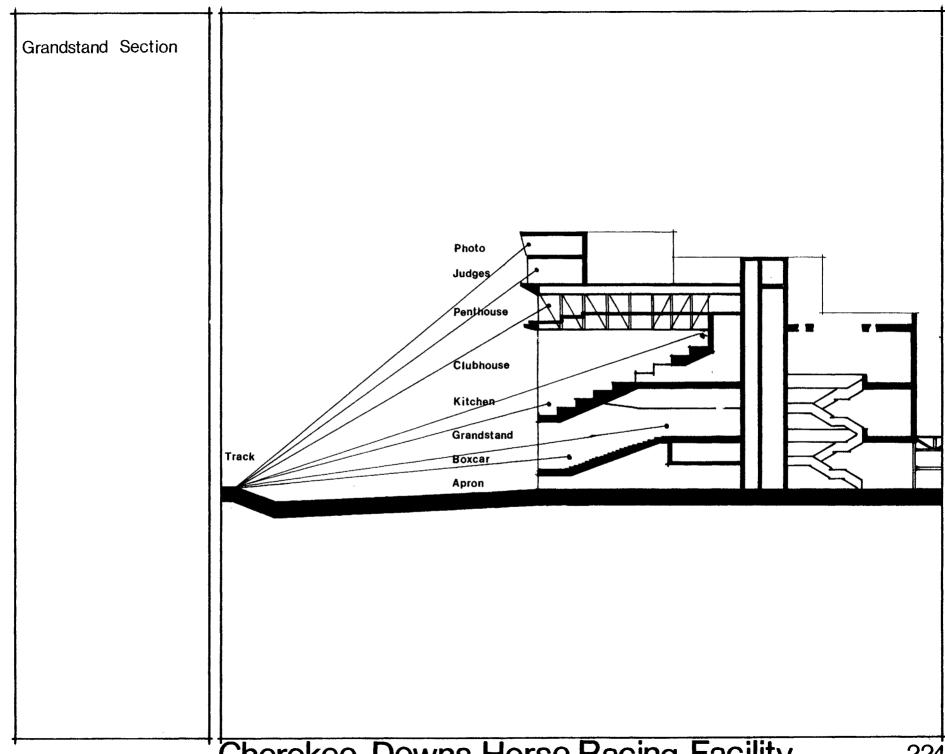
## Cut-Away Isometric

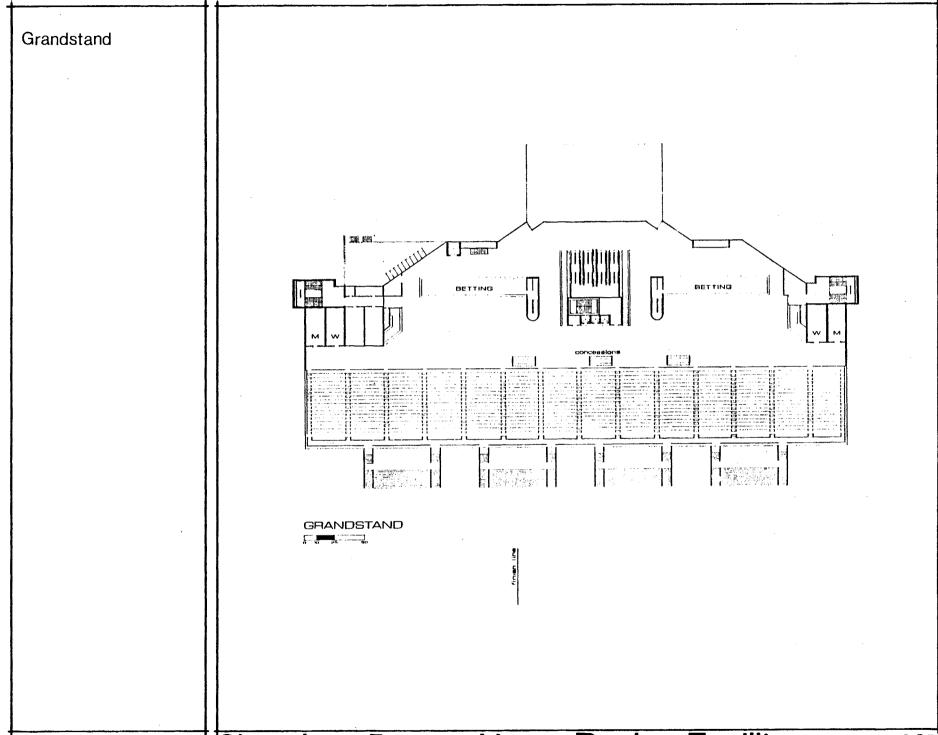
The basic structural system is large steel trusses at 32'-0" on center with secondary divisions at 16'-0" on center which is the base dimension for the Clubhouse Boxes. The glass facade panels are 8'-0" on center and are suspended from the roof.

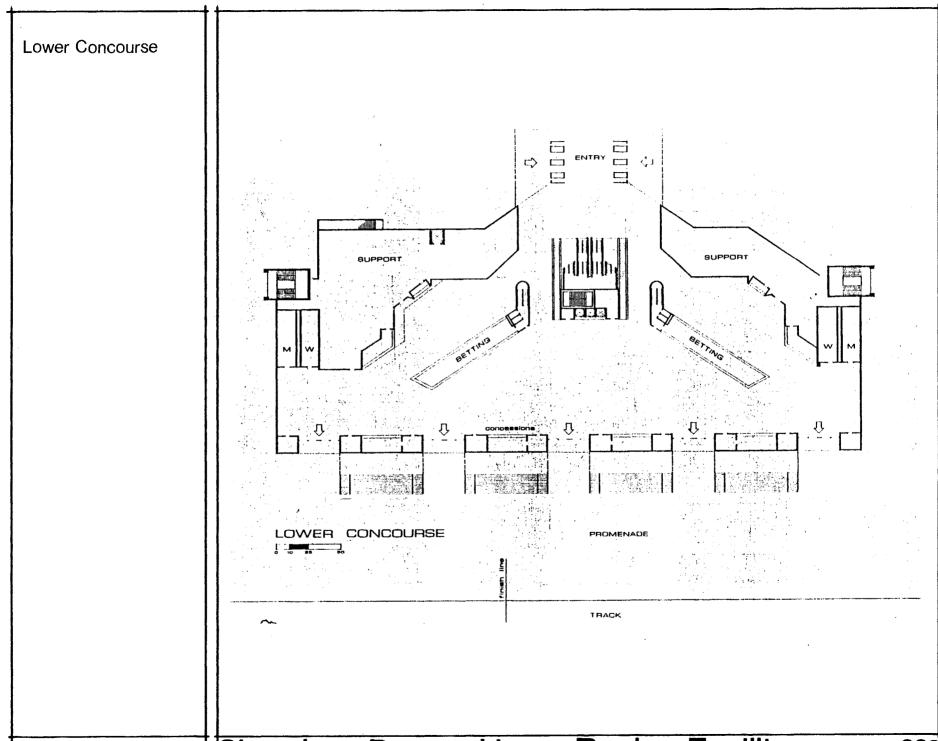
### Area Designation

- A. Judges Level
- B. Pressbox
- C. Penthouse Suites
- D. Club Level A
- E. Club Level B
- F. Grandstand level
- G. Lower Concourse
- H. Bleechers
- 1. Apron









Cherokee Downs Horse Racing Facility

Horse racing has an extremely long history with it's origins being in York, England during the Roman occupation. From that point on the "Thoroughbred" horse began to be perfected from a diverse history of Arabian Horses and the English or Northern Breed. It wasn't until the middle of the 18th century in New Market, Enland, that the first association of principle owners and breeders formed the first Jockey Club. The Jockey Club formed it's headquarters at New Market, England and developed the English Turf Institutions that would become models for the rest of the world. About 1790, the Handicap was first introduced. The handicap was the addition of weights to certain horses and riders by appointed officials to make the outcome of the races more even and thus making wagering more appealing to the masses. The most important development came in the late 18th century with the development of the Classic Horse Race. This was the supreme test for breeders to develope Thoroughbreds capable of excelling in races ranging from 1 to 1 3/4 miles in length. The first full-sized American race track was laid out in 1665, on Long Island to hold races mcdeled after the English. Later in the 1690's, 1 mile oval tracks began to spring up in Virginia on impoverished tobacco land. Virginia started to become very rich and horse racing and breeding began to grow very rapidly. As a further development, the men of Virginia and North Carolina developed a special breed of horse that excelled in the quarter mile, this breed, the American Quarter Horse, is unmatched even today at races of these short distances. During the late 1700's, with the colonization of Kentucky, horse racing and breeding grew like wild fire, since the Kentucky Blue Grass is considered the best in the world for grazing purposes. From 1800 on, horse racing grew very rapidly with horse racing facilities springing up all over the country. The first of these racing facilities was built in Saratoga Springs, New York in the year 1864. There is very little to no information available on the history or even general information on racing facilities.

