Facilities Planning and Construction

. e!er to Texas Tech

advanced event monitoring' The system integrates) ith critical business a##lications including video systems !rom *merican ynamics, as) ell as third1#arty devices such as !ire alarms, intercoms, and burglar and other alarms' This system is managed and maintained by the Texas Tech Police e#artment'

The TTU o!!icial - card can be used !or access or s#eciali4ed access devices are obtainable !rom vendors at the ex#ense o! each de#artment on cam#us' The Texas Tech Police e#artment can assist in #roviding a list o! vendors !or #urchasing these devices' The Texas Tech Police e#artment) ill maintain a list o! authori4ed #eo#le) ho can re(ues[illegible] can t#l( )-5 .15007n(t)-5 .15007aintaine . 590251(( )-5 . 2964(e)0 . 590251(o)0 . 590251,00 . 590251)7164(a)0eo902

e#artment o! Public Sa!ety and Private Security 2ureau !or their #ortion o! the) or/' The a) arded Contractor) ill be re(uired to submit this in!ormation to the Texas Tech Police e#artment' The Texas Tech Police e#artment may validate the licensing submitted) ith the State at their o#tion'

4cce &ontrol Sy te$

S#eci!ications are to be based on the So!t) are +ouse C1Cure BAAA Security "anagement System' The existing security management system $C1Cure System% is managed by TTP and hosted at T3S"' Contractor) ill be re(uired to #rovide ,thernet connection and #rogramming o! ne) So!t) are +ouse security devices, camera system and controller to be accessed on Texas Tech Police e#artment existing C1Cure Security System' The Com#any o! .ecord !or the Texas Tech University C1Cure System is Firetrol' Firetrol) ill be the only electronic security com#any authori4ed to modi!y0#rogram the existing C1Cure system !ront end server located at T3S"'

NOTE: TTU Universit Student !ousing is current" u

* !inal ins#ection) al/1through) ill be conducted) ith the Texas Tech Police e#artment to veri!y system o#eration and !inal acce#tance o! the) or/'

4cce &ontrol 6eneral De i#n 6ui-eline

1' Per!orm t) o $6% scheduled #reventative maintenance site visits #er year during the) arranty #eriod'

6' @ormal business hours shall be > * " to ? P " " onday through Friday' Calls !or service be!ore noon shall be res#onded to on1site be!ore the end o! the day' Calls a!ter noon shall be res#onded to on1site by noon the !ollo) ing business day'

<' The access control integrating com#any selected to install and maintain the system shall have du#licate system #arts available) ithin ?A miles o! installation site should any #art o! the system !ail'

8' *ll cabling and) iring must meet University guidelines' S#eci!ically, cabling may be installed in above ceiling cable trays' Cabling that is not utili4ing above ceiling, housed) ithin cable trays or leaving !rom a cable tray to a !inal destination should be in conduit o! the a##ro#riate si4e to accommodate the s#eci!ic number o! cables or lo) voltage) iring re(uired' *ll device cabling and) iring shall be labeled correctly) ith #ath) ays identi!ied be!ore termination in the iStar #anel' Dunction boxes above controlled0monitored doors or) indo) s shall be #laced above the ceiling on the secured side o! the o#ening' Dunction boxes shall not be accessible !rom the non1 secured side o! the door'

?' *ll security access and camera systems shall derive #o) er !rom ne) emergency #anels $!ed !rom generator%' 161volt battery bac/u# to #rovide 16 hours o! standby #o) er su##ly shall be #rovided'

7' The iStar intelligent !ield controller #anels should be installed in climate1controlled areas such as #hone or technology rooms) here access is controlled by maintenance or EtunnelF /eys' , lectronic security control systems are not to be #lanned or scheduled to be installed in the " ain istribution Frame $ " F% or -ntermediate istribution Frame $- F% s#aces'

G' Hiegand mag stri#e readers) ill not be an acce#table) ay to control access to controlled doors' Proximity readers or #roximity readers) ith /ey#ads are to be s#eci!ied at locations $controlled doors%) here card access is re(uired' Hiegand +- #roximity readers, So!t) are +ouse #roximity readers and So!t) are +ouse #roximity readers) ith /ey#ad and 9C dis#lay are re(uired'

>' *n , thernet net) or / #ort that resides on the TTP

* minimum o! one So!t) are +ouse iStar intelligent controller enclosed in a metal case using a loc/ing device /eyed the same as the existing #anels on cam

Division

b' 9oc/ing devices must be 681volt devices' 161volt loc/ing devices) ill not be acce#ted'

c' , lectric door stri/es !or all exterior doors) ill be #rogrammed to !ail1secure in the event o! building #o) er loss'

G' , lectri!ied oor +ard) are

a' 9oc/ing devices must be 681volt devices' T) elve volt loc/ing devices) ill not be acce#ted'

b' Coordinate door stri/e) ith door !rames'

c' , lectri!ied door hard) are !or all exterior doors) ill be #rogrammed to !ail1secure in the event o! building #o) er loss'

>' . emovable " ullions

a' Contractor shall #rovide a (uic/ disconnect and #igtail in the to# o! the mullion'

b' Contractor shall #rovide (uic/ disconnect, #o) er su##ly 16AC emergency #o) er, relays,) iring and conduit'

B' . e(uest1to1 , xit $. , J% evices;

a' Provide . , J; P- . or a##roved e(ual

b' Coordinate location o! device) ith door and) all conditions'

c' . e!er to #lans !or exact number and locations o! . , J's'

d' Provide installation connection #o) er su##ly, 16AC emergency #o) er, relays, bac/boxes,) iring and conduit'

1A' oor Position S) itches and Contacts;

a' Provide So!t) are +ouse0Tyco door contacts'

b' Contacts shall be hidden in the to# o! the door !rame' Coordinate re(uirement) ith door manu!acturer' Contacts behind the hinges are not acce#table'

c' Provide So!t) are +ouse0Tyco overhead contacts'

d' Contractor shall #rovide installation, connection, control) iring and #o) er su##ly'

11' *ccess Control Po) er Controller0Su##ly;

a' Provide one $1% dedicated circuit #o) er su##ly !or each -1star controller'

b' . e!er to #lan !or location o! #o) er su##ly'

c' Contractor shall #rovide installation, connection, #atch cords, 16AC emergency #o) er,) iring and conduit'

16' Panic *larm

a' Provide at least one $1% #anic button by USP +U26 Series or a##roved e(ual'

b' Coordinate location o! button) ith o) ner'

c' Contractor shall #rovide installation, control) iring and conduit

1<' " otion Sensor

a' Provide Sentrol 0 7 , P- . I *P1AAP- or a##roved e(ual'

b' Sensor shall be P- . Ty#e'

11' So!t) are and !irm) are as re (uired to #rovide a com#lete !unctioning system'
16' H iring and race) ay'
1<' -nstallation, testing and certi!ication and training'
18' -nter!ace) ith air handling units and stair) ell #ressuri4ation system'
1?' -nter!ace) ith Clean * gent Su##ression System serving com#uter rooms'
17' . emote annunciator #anel'

2e!ore commencing) or / , submit data sho) ing the Contractor has success!ully installed !ire alarm systems o! the same ty#e and design as s#eci!ied, or that they have a !irm contractual agreement) ith a subcontractor having the re (uired manu!acturers' training and ex#erience'
The Contractor shall include the names and locations o! at least t) o installations) here the Contractor, or the subcontractor above, has installed such systems' S#eci!y the ty#e and design !or each system and !urnish documentation that the system has #er!ormed satis!actorily !or the #receding 1> months'

Provide the services o! a re#resentative or technician !rom the manu!acturer o! the system, ex#erienced in the installation and o#eration o! the ty#e o! system #rovided' The re#resentative shall be licensed in the State o! Texas' The technician shall su#ervise installation, so!t) are documentation, ad&ustment, #reliminary testing, !inal testing and certi!ication o! the system' The technician shall #rovide the re (uired instruction to the 3) ner's #ersonnel in the system o#eration, maintenance and #rogramming'

The system shall be a com#lete, electrically su#ervised multi#lex style !ire detection and voice evacuation system) ith intelligent analog alarm initiation, to be device addressable and annunciated as described and sho) n on the ra) ings' Fire Control -nstruments is the acce#table manu!acture' 3ther manu!acturers meeting the re (uirements o! this s#eci!ication !or design, !unction and #er!ormance) ill be considered u#on submittal o! manu!acturer's data to the Texas Tech University Fire " arshal's 3!!ice'

The system shall su##ort intelligent analog smo / e detection, manual station,) ater !lo) , su#ervisory, security, and status monitoring devices' Fire alarm, su#ervisory, trouble, security and status shall each be treated as a se#arate level o! alarm, each) ith its o) n level o! #riority' The system shall also su##ort am#li!iers, voice&visual circuits, and stair) ell #ressuri4ation !ans and dam#ers'

The system shall be #rogrammed in the !ield via a la#to# com#uter' * ll #rogrammed in!ormation shall

) ill be #re#ared by the *cce#tance -ns#ector in accordance) ith @FP* G6, and the 3) ner's re(uirements' The Contractor shall be res#onsible !or the #er!ormance o! the *TP, demonstrating the !unction o! the system and veri!ying the correct o#eration o! all system com#onents, circuits, and #rogramming'

The Contractor shall) arrant the entire system against mechanical and electrical de!ects !or a #eriod o! 1> months' This #eriod shall begin u#on com#leted certi!ication and test o! the system' uring this) arranty #eriod the contractor shall res#ond to a trouble call) ithin 6 hours !or #roblem determination, and resolution to the #roblem) ithin 68 hours'
Construction documents !or !ire alarm systems shall be submitted !or revie) and a##roval #rior to system installation' Construction documents shall include, but not be limited to the !ollo) ing;

1' * !loor #lan) hich indicates the use o! all rooms'
6' 9ocations o! alarm1initiating and noti!ication a##liances'
<' *larm control and trouble signaling e(ui#ment'
8' *nnunciation'
?' Po) er connection'
7' 2attery calculations'
G' Conductor ty#e and si4es'
>' Coltage dro# calculations'
B' " anu!acturers, model numbers and listing in!ormation !or e(ui#ment, devices and materials'
1A' etails o! ceiling height and construction'
11' The inter!ace o! !ire sa!ety control !unctions'
16' Systems and their com#onents shall be listed and a##roved !or the #ur#ose !or) hich they are installed'