7.1.2(c) Sensor-based energy conservation

Energy efficiency is a key strategy for the sustainable growth of the planet. The University with this objective has sensor-based water conservation system installed in all the washrooms. Further, the optimization of energy resources is ensured with the installation of sensor-based entry gates at every building within the University premises.

There are two circuits: sensor module and controller module. PIR sensor module is used here to detect the Human body movement, whenever there is any body movement the voltage at output pin changes. Basically it detects the change in Heat, and produce output whenever such detection occurs. In controller module Relay is an electromagnetic switch, which is controlled by small current, and used to switch ON and OFF relatively much larger current. By applying small current we can switch ON the relay which allow much larger current to flow



Motion detection and optical sensors

Nowadays, most automatic doors operate with motion-detecting sensors. The majority of motion detectors use either microwave pulses or passive infrared (PIR) sensors to detect movement. Microwave beam motion detectors send out pulses of microwaves that measure the reflections of moving objects. In contrast, passive infrared sensors measure temperature changes to detect body heat. Sensors with microwave technology are usually more expensive than infrared sensors because they can cover a larger area. However, they are also at risk of electrical interference.

Registrar K.R. Mangalam University Sehna Road, Gurugram, (Haryana)



Registrar

K.R. Mangalam University

Sohna Road, Gurugram, (Haryana)

CENTRAL SA	ALES / T	AX, INVOIC	E (&	134	(Original)		
roshi Automatic Systems Pvt. Ltd.	SNI Automatic Systems Pvt. Ltd. Invoice No.						
ID - 132, BSR Industrial Area,		TASPL/13-14/CI/407			g-2013		
G: aziabad - 201009 Phone : +91-120-2705117	: Deli	Delivery Note			erms of Payment		
E-Mail :office@toshiautomatic.com	Cup	nlior's Dof	# A 24 Ft W	AS PE			
2 Wall Stribberg Contraction of the Contraction of	Sup	Supplier's Ref.			Other Reference(s)		
Buyer	Buyer's Order No.			Dated ·			
MANGALAM EDU GATE	1165			29-Jun-2013			
6/845, MAIN BAZAR	Des	Despatch Document No.					
MEHRAULI, NEW DELHI- 110030 MR. VINOD SHARMA		-					
MOB: 9953828251	Des		Destina				
		BY TRANSPORT Terms of Delivery					
*	FREIGHT PAID						
	FILE	IGHT PAIL	,				
•	ĺ						
		31			!		
SI Description of Goods		Quantity	Rate	per Dis	c. % Amount '		
. No. j			en a l'origination de contract dell'address à laborations de				
1 ElCMicro Assy. for Auto Door Controller		4 Set	66,866.60	Set	2,67,466.40		
EIC.MICRO ASSY.FOR AUTO SLIDING DOOR		(4 PCS)		-			
SD-806 WITH ACCESS.:	İ	7		į			
		٠ .					
INTERSTATE SALES 1		i	. 5	%	13,373.32		
ROUP	VD OFF	:	•	1	0.28		
· ·	ĺ	i		i			
	. !		, , 0	1			
Reserved o4 get /	Ly do	for Con	solling		!		
hereive 1	'n	1	P	1			
	_ V.		1/3				
(CAN	- (K	and				
	26 8	3	26/27/	3	~~3·		
		071		1			
1.	Total	4 Set			₹ 2,80,840.00		
Amount Chargeable (in words)					E. & O.E		
Hian Rupees Two Lakh Eighty Thousand Eight Mundred Forty Only	MAN	GALAM EDU (GATE SECUL	NA CHE			
Mundred Forty Only			,0200	WIT CHE	UK .		
John h							
y white	1 5	SIGNATURE	L. I Dolan		410		
01/41	1	on the long	M.J.A.	TE26)(810		
Company's VAT TIN : 09288818962 w.e.f. 17.08.201	11 17	O BE	PAID	BY)		
Company's Service Tax No.: AADCT8510ESD001	1	NTRAL B.					
Company's PAN : AADCT8510E							
Declaration 1. Payment through Bank DD or Cheque only. 2. No claim	Date	d 20 -0	DT//	1.0/			
are entertained unless brought to our notice in writing with	Cash	Ch. No	lor rust	1 Automa	itic Systems Pvt Ltd.		
in 24 hours of receipt of material. 3. In case of overdue	Sign	13. 2,1	Ra, A. Yu:	- A.A			
accounts we charge you interest or expense 12% pa. 4. All Disputes subject to Ghaziabad Jurisdiction only.				~~~~	mar		
	or Copora	tod lavoles			Authorised Signatory		
he laymond was delayed due to on-pundaning of the system	5 .	neu myolce	,		,		
of adomin A une Suxtem	1.5		1/2	, 1	Ja		
on-profession of the TIS	201	_	1 4~	2,8%	nial-		
venue of Dro	, – –		B	2,8%	840/1°		
inn	95				MM		
	71		AN				
(2)			1		4/09.		
			0.		. (_ /		
en en en manifestat capital est la consentación de consentación de managrata qual en extendic l'ences.			Registrar		The second of th		

K.R. Mangalam University

Sohna Ross Guri Generalaryana)

CENTRAL SAL		ICE II	63	(Original)		
O- BSR Industrial Area,	Invoice No.		Dated	1		
Genziabed - 201009	TASPL/13-14	I/CI/264	2-Jul-201	2-Jul-2013		
Phone 1:+91-120-2705117	Delivery Note			Mode/Terms of Payment		
E-Mail :office@toshiautomatic.com	Compliant		100% AG	AINSTDELIVERY		
	Supplier's Ref.		Other Refe	rence(s)		
Buyer	Buyer's Order I					
MANGALAM EDU GATE	1165	NO.	Dated			
6/845, MAIN BAZAR	Despatch Docu		29-Jun-2013			
MEHRAULI, NEW DELHI- 110030	Despater Doct	ment No.	Dated			
MR. VINOD SHARMA MOB: 9953828251	Despatched thr	Ough	Darkingti			
	BY TRANSPORT		Destination			
			DELHI			
	FREIGHT PAID , Mangalas			L'du Gale		
	20 2 3 20 1 20 1	Sold	ena. L	111a eran		
* · · · ·		,	()	in agains!		
				*		
Description of Goods						
0.	Quantity	Rate	per Disc. %	Amount		
MISC. PARTS OF ENTRANCE AUTOMATIONS						
MINOSITARTO OF ENTRANCE AUTOMATIONS	6 PCS	9,800.00 F	cs	58,800.00		
ALU.CHANEL & COVER	(6 Set)			00,000.00		
				ĺ		
	•					
INTERSTATE SALES TAX	5%	5 9	6	0.000.00		
		ار ا	"	2,940.00		
		1		•]		
<u>*</u>						
1 con the stand it	11-					
(This mounted is a	base					
(This moternal is a dulony arguest Po. 1	40. 11KX	alt 29	M -7	-117		
activity ingeres	1108	or g	gn	W72).		
/ ()		j				
Soluth 61740]				12		
	otal 6 PCS					
ount Chargeable (in words)	6 PCS		JM ₹	61,740.00		
an Rupees Sixty One Thousand Seven Hundred		fm	/			
ty Only	06 Pes			-		
â	al Fee	menium	at si	Le		
Dany's VAT TIN UP 14 - BT 2230	06/40		_ ^			
011 65 22		()	Th.	1		
UY 19 -13	G		Hon net	5		
	9	017/17	2/7/1	2		
Party's Service Tax IVO. : AADCT8510E6D001	· Muraul A	4117	/ // (, 1		
ration						
Vment through Bank DD or Change						
ntertained unless brought to our notice in writing with hours of receipt of material. 3. In case Casadus, 100.	01-13					
nours of receipt of material. 3. In case Gas a fuer, 140.0	15292 k	for loshi At	Itomatic Syst	ems Pyt. Ltd.		
ints we charge you interest or expensed (% pa. 4.5.) sputes subject to Ghaziabad Jurisdiction chil	740/	aux	$u \rightarrow a$	uel.		
our our out of the			Authori	sed Signatory		
This is a Computer Gene	erated Invoice	/ \				
6.0 H 1200 11		()				
7. N. H MIS9 dated 02/04/8	2013	\	LAMEDE OF	TE SECTION CHECK		
Sugar Non Bon Do.	/3.	MANG	ALAM EUU GA	HE SECURIT TOREON		
your noadeines.	Ver luch.	far.				
Vehile# UPILAT 2220.	Veriani	1		والماء		
This is a Computer General R. It 4159 dated 02/04/8 huru Dev Roadlines. Velicle # UP14BT-2230.	pasmul	1	NATURE SWI	LEMOATED LUCTU		
	N 61740	SIG	MAINING			
4	′′ <	21/03	ia.	The		
	THE TOWNS MAKE	7,1,0	TEST CONTRACT	U		
				menerophism in the supple of pilling		
				Registrar		

K.R. Mangalam University
Sohna Road, Gurugram, (Haryana)

(4359) (4359)

Tax Invoice

GELD TECH SENSOR

GROUND FLOOR PLOT NO 138, KH NO 2/22/23/24 MAIN 25 FOOTA ROAD STREET NO 4, GANESH NAGAR BURARI NORTH DELHI - 110064

K.R. Mangalam Univer Haryana 122163 Sons	rsily Sohna Ruad na Rural, Sohna, I	Gutugram, isryana	GTS-2324-117	04-08-2023	
		R. R. Mangalam University K.R. Mangalam University Sonna Rust Gutugram, Haryana 122103 Sonna Rural Sonna Haryana 122103			
0.000	Oly.	Units	Rate	Amount	
Plus	150	1	600	90000	
	8,40 1,359 1,359	i4 3			
		St	ib Total	90000.00	
		SGST	18% 0%	16200.00	
One Lakh Six Thousand Two Hundred Only		Ro	Mark was the same and a same and	0.00	
1			Fo	GELD TECH SENSOR	
	d Two Hundred C	d Two Hundred Only	Sto (9)8 Sto (9)8	Sub Total IGST 18% Sq87 0% Round Off Total R For GE	

2000 1 (8/1/ 8/0) 20 11/8/20

Registrar
K.R. Mangalam University
Sohna Road, Guri, Jana (1988)