



RoboCup@Home

Forms & Score Sheets

Version: 2024 0

Last Build Date: March 6, 2024 Time: 770

Registration Form



Team name:			
Team leader name:			
Safety first!			
The speed of the robots shot than the local speed limits. pace of humans (6 kph, 3.7	During operation in an ex		_
At any time when operating immediately if there is a remember of the Technical or team to stop the robot, the	note possibility of dangerour Organizational committee	us behavior towards peoplee, an Executive or Trust	le and/or objects. If a refere tee of the federation tells th
If the team does not compimmediately by a decision members can be banned fr RoboCup Federation Truste	of the RoboCup@Home Tom future competitions for	Technical Committee. Fu	erthermore, the team and i
	Robot 1	Robot 2	
Size of the robot			
Emergency button(s)			
Start button			_
Collision avoidance			
Voice of the robot			
Robot speaker system			
Use of external devices			
ASR Bypassing method			
Other safety issues			
Custom containers.			
External Devices: I have read and fully understhe rules in the official Rob	=	atement and agree to it.	Furthermore, I agree to ob
Date & time	$\frac{}{Team\ leader}$		

RoboCup @Home

Test:	Poster Session	
Team name:		
Referee name:		

Instructions:

- 1. Please watch all posters carefully.
- 2. There will be a team member for questions about the poster.
- 3. After viewing the poster and asking your questions you may have, please fill in the evaluation sheet below.
- 4. Is not allowed to evaluate your own team.
- 5. You may use the space below "Remarks:" to take notes for yourself.
- 6. Enter your team's name ("Team name") and your name ("referee name") on top of the sheet.
- 7. Sign the form using either "Referee" or "Team leader" slots at the bottom.

Evaluation sheet

Team	Overall score
1eam	of poster (0-10)
Austin Villa@Home	
Australian Centre for Robotic Vision	
CARL@Home	
CATIE Robotics	
eR@sers	
Hibikino-Musashi@Home	
homer@UniKoblenz	
KameRider OPL	
KameRider SSPL	
LiU@HomeWreckers	
LyonTech	
ORIon	
Pumas	
PUMAS-DSPL	
RoboCanes-VISAGE	
RoboFEI@Home	
RT Lions	
SinfonIA Pepper Team	
Team Northeastern	
Team Tidyboy	
Tech United Eindhoven	
Tinker	
Uchile Pepper	
UNSW@Home	
UTS Unleashed!	
Walking Machine	

Remarks:

$\overline{\textit{Date \mathcal{G} time}}$	Referee	Team leader

 $Date \ \ \mathcal{U} \ time$



Test:	Carry my Luggage			Ro	@Home
Team name:					
Referee name:					
The maximum tir	ne for this test is 5 minutes.				
Action		Score	1^{st} try	2^{nd} try	3^{rd} try
Main Goal			-	-	-
Perceiving the con	rrect beg (visualize on screen or say which one)	15			
Picking up the co	rrect bag	100			
Following the pers	son to the car	300			
Avoiding the crow	vd of people obstructing the path	50			
Avoiding the sma	ll object on the ground	50			
Avoiding the hard	l-to-see object	50			
=	blocked with retractable barriers	50			
Bonus rewards					
Re-entering the a	rena	100			
	ng in the queue on the way to the arena	300			
Penalties					
Dropping the bag		-50			
$egin{aligned} egin{aligned} egin{aligned\\ egin{aligned} egi$		00			
	operator by natural interaction	-50			
=	operator by unnatural interaction	-100			
_	operator by direct contact	-200			
		-200			
Special Penaltie	es & Bonuses	500			
Not attending	atant signal	-500			
Using alternative	start signal	-100			
Score per try		1015			
Total Score		1116			
Remarks:					

 $Team\ leader$

Referee



Test:	Clean Up			Ro	@Home
Team name:	•				
Referee nam	e:				
3.6				-	. ,
Maximum t	time:			5 1	ninutes
Action		Score	1^{st} try	2^{nd} try	3^{rd} try
Regular Rewa	at the appropriate location	6×100			
Bonus Rewar		0 × 100			
Moving a tiny of		200			
Moving a heavy		200			
Regular Pena					
	at the wrong location	6×-50			
	hina Penalties				
Physically inter	acting with object	6×-60			
Guiding the rob	oot near an object to be moved	6×-40			
Telling where a	n object can be found	6×-30			
_	hich category an object is or where to place it	6×-30			
Pointing out ob	ject to be moved	6×-20			
	$ties {\it ear E} Bonuses$				
Not attending		-500			
Using alternativ	ve start signal	-100			
Score per try		1000			
Total Score		1100			
Remarks:					
Date & time			Team le	ader	



Test:	Farewell			RC	@Home
Team name	e:				
Referee nai	me:				
The maximu	m time for this test is 5 minutes.				
Action		Score	1^{st} try	2^{nd} try	3^{rd} try
Main Goal					
	uccessfully guided to thier cab	2×200			
	he medical doctor	200			
Bonus rewe					
Delivering th	9	2×100			
	guest with conversation while ushering pe	rson to the cab 2×100			
Deus Ex M	lachina ot which guest is leaving	2×-30			
	robot to the cab	2×-30 2×-120			
=	robot to the cab robot back to the house	2×120 2×-120			
_	hich person is a medical doctor	-200			
Handover the	-	2×-100			
	nalties & Bonuses				
Not attendin		-500			
Using alterna	ative start signal	-100			
$Score\ per\ t$	ry	1000			
Total Score)	1100			
Remarks:					
Date & time			Team le	eader	



Test:	Find my Mates			RC	фоСир [®] Ноте
Team name:	-				
Referee nam					
The maximum	n time for this test is 5 minutes.				
Action		Score	1^{st} try	2^{nd} try	3^{rd} try
Main Goal					
Report a gues		2×100			
	on unique feature	2×50			
Provide descri	ption of a guest	2×150			
Bonus rewa					
•	d guest location	150			
Provide descri	ption of a 3rd guest	250			
Deus Ex Mo					
	wave the robot in order to be found	2×-75			
	tell the robot where he/she is sitting/standing				
	approach the robot (e.g. walk and stand in fro	ont of it) 2×-150			
_	$alties~ {\it \& Bonuses}$				
Not attending		-500			
Using alternat	ive start signal	-100			
$Score\ per\ tr$	y	1000			
Total Score		1100			
Remarks:					
Date & time	$\overline{Referee}$		Team le	eader	

 $Date \ \ \mathcal{U} \ time$



_				Ro	BoCup @Home
Test:	General Purpose Service Robot				
Team name:					
Referee name	:				
The maximum	time for this test is 5 minutes.				
Action		Score	1^{st} try	2^{nd} try	3^{rd} try
Main Goal					
Executing the t	ask associated with each command	3×400			
Bonus Rewar					
_	a command given by a non-expert operator	3×100			
	china Penalties				
Using a custom		3×-50			
Bypassing speed	_	3×-50			
centage penalty	uman to perform parts of the task will apply according to similar penalties in other Stage I	-			
-	$ties~ {\it \& Bonuses}$	~ 00			
Not attending	4 4 4 1	-500			
Using alternativ	ve start signal	-100			
Score per try		1500			
Total Score		1650			
Remarks:					

 $Team\ leader$

Referee



Test:	Receptionist				@Home
Team name:					
Referee name	:				
The maximum	time for this test is 5 minutes.				
Action		Score	1^{st} try	2^{nd} try	3^{rd} try
$\overline{Main~Goal}$					
Navigate to the	e door, when the door bell rings	2×15			
Guide the guest	t to the other guests (navigate to the guest group)	2×100			
Look in the dir	ection of navigation or at the navigation goal	2×50			
Introduce a nev	v guest to every other guest	2×50			
Offer a free sea	t to the new guest	2×100			
Look at the per	rson talking	2×25			
Look at the per	rson the robot is introducing the guest to	2×50			
Qualitative rob	ot social performance	50			
Bonus Rewar	ds				
Open the entra	nce door for a guest	2×100			
Describe the fir	st guest to the second guest	150			
Penalties					
Wrong guest in or drink)	formation was memorized (continue with wrong nam	e − <i>50</i>			
Persistent inapp	propriate gaze (away from conversational partner)	-50			
Persistent gaze	not in the direction of the navigation while moving.	-10			
Deus Ex Mad	china				
Alternative HR	I	2×-75			
Not recognizing	g people	2×-200			
Special Penal	$ties~ {\it \& Bonuses}$				
Not attending		-500			
Score per try		1180			
Total Score		1298			
		1290			
Remarks:					
Date & time	Referee		Team le	eader	



Test:	Serving Drinks			RC	@Home
Team names					
Referee nan					
The maximum	n time for this test is 5 minutes.				
Action		Score	1^{st} try	2^{nd} try	3^{rd} try
$\overline{Main~Goal}$		20010	1 013		
	guest without a drink and take order	3×50			
Picking up co	rrect drink from the bar	3×80			
Delivering a d	lrink to the right person	3×70			
Bonus rewa	rds				
Informing a g	uest of drink unavailability upon request	200			
Correcting the	e bartender	2×100			
Regular Per	nalties				
	guest with a drink and take order (per wrong guest)	-50			
Approaching	the host to take an order	-50			
	achina Penalties				
	to the robot to place order	3×-30			
	ches the robot to place order	3×-50			
	over to the robot (bypass picking)	3×-30			
	y a guest (bypass drink handover)	3×-30			
_	$alties \ {\it \& Bonuses}$	500			
Not attending		-500			
Using alternate	tive start signal	-100			
Score per tr	y	1000			
Total Score		1100			
Remarks:					
Date & time	$\overline{Referee}$		Team le	eader	



Test:	Serve the Breakfast				@Home
Team name:					
Referee name:					
The maximum ti	ime for this test is 5 minutes.				
Action		Score	1^{st} try	2^{nd} try	3^{rd} try
$\overline{Main~Goal}$					
Initial navigation	n to pick up area	15			
Perceiving object	t and categorizing it correctly (visualize or say)	4×15			
Picking up break	sfast items for transportation to the table	4×50			
Placing breakfas	t items on the table	4×50			
Pouring cereal in		300			
Bonus Reward	ls				
Pouring milk int		300			
=	next to the bowl	100			
Penalties					
	pping an object on the table	4×-30			
Spilling cereal w		-100			
Spilling milk wh		-100			
Deus Ex Mach	-				
Pointing at an o		4×-5			
	ct over to the robot	4×-20			
	g an object on the table	4×-60			
= =	g cereal in the bowl	-100			
Special Penalt					
Not attending	ics of Donases	-500			
Using alternative	e start signal	-100			
Score per try		1175			
Total Score		1292			
Remarks:					
Date & time			Team le	eader	

 $Date \ \ \mathcal{U} \ time$



Test:	Storing Groceries				@Home
The maximum time for this test is 5 minutes. The maximum time for test is 1 to correctly (visualize or say) The maximum time test is 4 minutes. The maximum time torrectly (visualize or say) The maximum time test is 4 minutes.					
Referee name:					
Referee name: The maximum time for this test is 5 minutes. Action Main Goal Navigating to the table Perceiving object and categorizing it correctly (verticking up an object for transportation to the categorizing objects in shelf and saying on which handled object should be placed (visualize or say Placing an object in the cabinet Placing an object next to similar objects on the elementary object of the cabinet door without human help Placing and placing a tiny object Picking and placing a tiny object Picking and placing a heavy object Penalties Storing an object without categorizing it correctly the cabinet and an object over to the robot and human handing an object over to the robot and human placing an object in the cabinet at a locatory the robot A human placing an object in the cabinet at a locatory the robot A human placing an object in the cabinet at a locatory the robot A human placing an object in the cabinet at a locatory the robot A human pointing at a target location Special Penalties & Bonuses Not attending Using alternative start signal Score per try Total Score Remarks:					
The maximum tin	ne for this test is 5 minutes.				
		Score	1^{st} try	2^{nd} try	3^{rd} try
		15			
	·				
0 1		5×50			
		rrently 5×15			
•	-	_ ,_			
0 0		5×15			
	-	5×50			
= =		200			
		100			
	ng a heavy object	100			
		5×-60			
	• • • • • • • • • • • • • • • • • • • •	clearly 5×-15			
A human handing	an object over to the robot	5×-30			
	an object in the cabinet at a location clearly inc	dicated 5×-45			
A human placing	an object in the cabinet	5×-90			
	an object in the cabinet at a location clearly inc	dicated 5×-30			
A human pointing	at a target location	5×-45			
$Special\ Penaltie$	$es \ {\cal E} \ Bonuses$				
•		-500			
Using alternative	start signal	-100			
Score per try		1140			
Total Score		1254			
Remarks:					
$Date \ \ \ \ time$	Referee		Team le	eader	



Test:	Take out Garbag	e			AC	@Home
Team name:						
Referee nam	ne:					
Maximum	time:				5 r	minutes
Action			Score	1^{st} \mathbf{try}	2^{nd} try	3^{rd} try
Regular Rewa			0000			
	ide the designated zone		2×300			
Bonus Rewar			0,, 100			
Opening the bin			2×100 200			
Carry both bag Regular Pena			200			
	tside collection zone		2×-100			
Tipping a bin /			2×-50			
	hina Penalties		2/ 00			
	ag via handover		2×-250			
_	$ties~ {\it \&Bonuses}$,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,			
Not attending			-500			
Using alternative	ve start signal		-100			
Score per try			1000			
Total Score			1100			
Remarks:						
Date & time		$\overline{Referee}$		Team le	ader	



Test:	Clean the Table				@Home
Team name:					
Referee name	:				
The maximum t	time for this test is 10 minutes.				
Action		Score	1^{st} try	2^{nd} try	3^{rd} try
$\overline{Main~Goal}$					
Navigate to the	table to pick up items	15			
Picking tablewa	re (cup, bowl) for transportation to the dishwasher	2×40			
Picking up a pla	ate for transportation to the dishwasher	50			
Picking up cutle	ery (spoon, fork) for transportation to the dishwasher	2×80			
Placing the tabl	eware and cutlery inside the dishwasher	5×50			
Placing an item in the dishwashe	correctly (cleanable, convenient like a human would)	5×50			
Bonus Reward					
Pulling out the		100			
Pushing in the o		100			
Opening the dis		200			
Closing the dish		200			
_	dishwasher tab for transportation to the dishwasher	100			
	washer tab inside the dishwasher's hatch intended for				
the tab	washer tas histae the dishwasher s haten interfed for	200			
Deus Ex Mac	hina Penalties				
Pointing at an o	object or telling the robot where an object is	5×-20			
Handing an obje	ect over to the robot	5×-70			
Placing an object	ct	5×-180			
Special Penalt	$ties~ {\it \& Bonuses}$				
Not attending		-500			
Using alternativ	e start signal	-100			
Score per try		1705			
Total Score		1875			
Remarks:					
Tuesta iisi					
Date & time	$\overline{Referee}$		Team le	eader	



Test:	Enhanced General Purpose Service Rob	oot		AC	@Home
Team name:					
Referee name:					
The maximum ti	me for this test is 10 minutes.				
	me for this test is 10 innitites.				
Action		Score	1^{st} try	2^{nd} try	3^{rd} try
Main Goal Find and clearly	state an encountered problem	3×150			
Solve a problem	state an encountered problem	3×650			
Deus Ex Mach	ina Penalties	37.000			
Asking for location		3×-200			
Instructing a hur	man to perform parts of the task will ap				
centage penalty a	according to similar penalties in other Sta	ge II tests.			
Special Penalti	es & Bonuses	~			
Not attending	4 4 1 1	-500			
Using alternative	start signal	-100			
Score per try		2400			
Total Score		2640			
Remarks:					
itemarks.					
Date & time	$\overline{Referee}$		Team le	eader	



Test:	Find my Disk			Ro	@Home
Team name:					
Referee name:					
The maximum t	ime for this test is 5 minutes.				
Action		Score	1^{st} try	2^{nd} try	3^{rd} try
$\overline{Main~Goal}$					
	rate description of the desired disk	600			
Desired disk is fe		600			
Bonus rewards		200			
	ing & Remand	800			-
Not attending	$ies {\it \& Bonuses}$	-500			
Using alternative	e start signal	-100			
Score per try		2000			
Total Score		2200			
Date & time			$\overline{Team\ le}$	eader	

 $Date \ \ \mathcal{U} \ time$



Test:	Hand me That			RC	@Home
Team name:					
Referee name	:				
The maximum t	time for this test is 10 minutes.				
Action		Score	1^{st} try	2^{nd} try	3^{rd} try
Main Goal					
Correctly determ	nine each item	5×400			
Correctly determ	nine an item on the second attempt	5×-150			
Correctly determ	nine an item on the third or fourth attempt	5×-300			
Correctly determ	nine an item on a subsequent attempt	5×-400			
Asking 1 clarify	ing question	5×-100			
Asking 2 clarify	ing questions	5×-200			
Asking 3 or mor	re clarifying questions	5×-350			
Deus ex Mach	nina Penalties				
Being told the n	name of the object	5×-400			
Special Penalt	ties & Bonuses				
Not attending		-500			
Using alternativ	e start signal	-100			
Score per try		2000			
Total Score		2200			
Remarks:					

Referee

 $Team\ leader$



Test: Se	t the Table				@Home
Team name:					
Referee name:					
The maximum time f	or this test is 10 minutes.				
Action		Sco	${f re} = 1^{st} {f try}$	2^{nd} try	3^{rd} try
Main Goal					
Open the drawer or c	upboard door	10	00		
Pick up plate and cup	o O	$2\times$	50		
Pick up knife, spoon,	and fork	3×1.	50		
Pick up napkin			50		
Correctly place each	item	5×10	00		
Pointing at object		5×-2	25		
Pointing at destination	on	5 imes – .	50		
Bonus rewards					
Layplace mat before	objects	50	00		
Placing all objects co		2.	50		
Closing the door or d			50		
Special Penalties &					
Not attending		-50	00		
Using alternative star	t signal	-10			
Score per try		200	00		
Total Score		220	00		
Remarks:					
Date & time			\overline{Team}	leader	



Test:	Restaurant			Ro	@Home
Team name:					
Referee name:					
Maximum tim	ne:			15	minutes
Action		Sco	${f re} = 1^{st} {f try}$	2^{nd} try	3^{rd} try
$\overline{Regular\ Rewards}$			<u>.</u>		
Detect calling or w		2×1			
	s table without prior guidance/training				
Take an order.		2×3			
Serve an order.		2×3			
Qualitative robot s	social performance		50		
Bonus Rewards		00	00		
Use an unattached		2×2	00		
Regular Penaltie	es ntact when taking an order	2×-1	00		
Deus ex Machin	~	2×-1	<i>00</i>		
Being guided to a		2×-2	00		
	n to handover object to the robot	4×-1			
	ake the object from a tray or the robo				
_	where is a table/Kitchen-bar	2×-1			
Special Penalties					
Not attending		-5	00		
Using alternative s	tart signal	-1	00		
Score per try		20	50		
Total Score		22	55		
Remarks:					
			_		
Date & time	$\overline{Referee}$		\overline{Team}	leader	



Test:	Smoothie Chef			RC	@Home
Team name	e:				
Referee na	me:				
The maximu	m time for this test is 10 minutes.				
Action		Score	1^{st} try	2^{nd} try	3^{rd} try
$\frac{Main\ Goal}{}$		Score	1 01 y	2 01 y	o dry
	aree fruits in the blender	3×200			
_	aspoon of sugar in the blender	300			
_	in the blender	300			
Bonus Reu	vards				
Pouring suga	ar in the blender without spilling	400			
Pouring milk	in the blender without spilling	400			
Regular Pe	nalties				
Placing an ir	acorrect fruit into the blender	3×-200			
Deus Ex M	Iachina Penalties				
Starting the	test in front of the kitchen counter	-150			
Handing an	object over to the robot	-200			
Telling the re	obot which ingredient comes next	-250			
Using a custo	om operator	-250			
Special Per	$nalties~ {\it \&Bonuses}$				
Not attendin	_	-500			
Using alterna	ative start signal	-100			
Score per t	ry	2000			
Total Score)	2200			
Remarks:					
Date & time	$\overline{Referee}$		Team le	eader	



Test:	Stickler for Rules				@Home
Team name:					
Referee name:					
Maximum tim	e:			10	minutes
Action		Score	1^{st} \mathbf{try}	2^{nd} try	3^{rd} try
Regular Reward					
Identify a guest b log).	reaking a house rule (indicating the rule by vo	pice or 4×100			
-/	ct, politely clarify to the guest what action he	should 4×100			
Confirm that the	guest is following the rule.	4×200			
Bonus Rewards Making eye-conta broken.	ct, politely clarify to the guest what rule is	being 4×100			
Regular Penalta Talking to a gues	ies t about a rule they are not breaking	4×-100			
Deus ex Machi					
	the robot towards a guest who is breaking a r				
	e robot which rule is being broken	4×-100			
Special Penaltic Not attending	es & Bonuses	-500			
Using alternative	start signal	-100			
Score per try		2000			
Total Score		2200			
Remarks:					
Date & time	$\overline{Referee}$		Team le	eader	

 $Date \ \ \mathcal{U} \ time$



Test:	Where is this			Ro	@Home
Team name:					
Referee name:					
The maximum tir	me for this test is 10 minutes.				
Action		Score	1^{st} try	2^{nd} try	3^{rd} try
Main Goal			-	-	-
Describing and sh	low the requested location accurately	3×100			
Monitoring opera	tor's navigation, intervening when necessary	3×200			
Describing the are	eas of the Arena traversed during navigation	3×100			
Bonus rewards					
Leading non-expe	rt operator	3×100			
	ns to returning operator based on previous instruc-	300			
tions					
Natural interaction	on while guiding	200			
Deus Ex Mach					
Bypassing speech		3×-50			
	find the operator	3×-150			
$Special\ Penaltic$	_				
Not attending	50 C 20104000	-500			
Using alternative	start signal	-100			
Score per try		2000			
Total Score		2200			
Remarks:					

 $Team\ leader$

Referee



$\mathbf{S}_{\mathbf{G}}$	core	Sheet			RoboCup @Home				
Test: Team name: Referee name:		Final Dem	onstration — Jury Evalua	tion	@Home				
		e:							
		nme:							
\mathbf{Ins}	truction	as:							
2 2 2 2 5	 Please watch all demonstrations carefully. At the end of the demonstration you may ask questions. After demonstration and questions, please fill in the evaluation sheet below. You may use the space below "Remarks:" to take notes for yourself. Enter your your name ("referee name") on top of the sheet. Sign the form using the "Referee" slot at the bottom. 								
Eva	aluation	sheet							
	Team	Originality and presentation* (0-10)	Relevance/usefulness to everyday life (0-10)	Elegance of overall demonstration (0-10)	Success of overall demonstration (0-10)				
	Fifth Fourth								
	Third Second First								

Remarks:

Referee $Date \ \ \mathcal{U} \ time$ $Team\ leader$ RoboCup@Home Forms & Score Sheets / Final version for RoboCup 2024 (Revision $_0)$

^{*} Story telling is to be rewarded

 $Date \ \ \mathcal{U} \ time$



Test:	Final Demonstration	on — Executive Committee		@Home		
Team na	me:					
Referee r						
 At th After You Ente 	se watch all demonstrations he end of the demonstration r demonstration and question	you may ask questions. ons, please fill in the evaluation demarks:" to take notes for you name") on top of the sheet.				
ContRele	ntific contribution tribution to @Home vance for @Home / Novelty entation and performance in					
Evaluatio	on sheet					
Team	Efficacy of solution to main objective (0-10)	Elegance of solution to main objective (0-10)	Innovation/contribution of additional tasks (0-10)	Difficulty/Success of overall demonstration (0-10)		
Fifth						
Fourth						
Third						
Second						
First						
Remarks						

Referee

 $Team\ leader$