# **CPRIT University Advisory Committee: 2023 Annual Report**

**CPRIT Oversight Committee Meeting** May 17, 2023

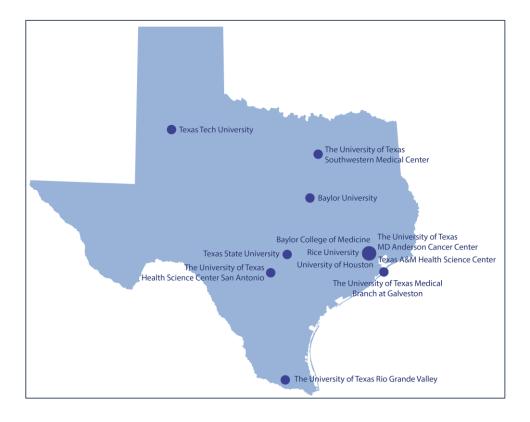


# University Advisory Committee (UAC) – Membership FY2022 - 2023

Peter Davies, M.D., Ph.D. Chair, Head. Dept of Translational Medical Sciences Director, Center for Translational Cancer Research Texas A&M Health Science Center Translational cancer research – CPRIT – funded investigator	Carlos L. Arteaga, M.D. (Vice Chair) Director of the Harold C. Simmons Comprehensive Cancer Center Associate Dean of Oncology Programs The University of Texas Southwestern Medical Center Clinical oncologist – CPRIT Scholar
Pavan Reddy, MD Director. Dan L Duncan Comprehensive Cancer Center Baylor College of Medicine Clinical Oncology – CPRIT Scholar	Shreek Mandayam, Ph.D. Vice President for Research Texas State University Engineering
Abbey B. Berenson, M.D., MMS, Ph.D. Professor of Obstetrics/Gynecology and Pediatrics Director, Center for Interdisciplinary Research in Women's Health The University of Texas Medical Branch at Galveston Clinical researcher, CPRIT – funded investigator	Claudia Neuhauser, Ph.D. Associate Vice President for Research and Technology Transfer HHMI Professor, Mathematics, Division of Research University of Houston/University of Houston System Mathematics and Quantitative biology
Subhash C. Chauhan, Ph.D. Professor and Chairman, Department of Immunology and Microbiology Director, South Texas Centre of Excellence in Cancer Research The University of Texas Rio Grande Valley CPRIT funded investigator and TREC PI	Ramamoorthy Ramesh, Ph.D. Vice President for Research Professor of Materials Science, Physics and Astronomy Rice University Materials science and physics
Giulio F. Draetta, M.D., Ph.D. Chief Scientific Officer Chair, Department of Genomic Medicine, The University of Texas MD Anderson Cancer Center Translational Cancer research – CPRIT Funded investigator	John Louis Wood, Ph.D. Robert A. Welch Distinguished Professor Professor of Chemistry & Biochemistry Baylor University Chemistry – CPRIT Scholar
Pending The University of Texas Health Science Center San Antonio	Joseph "Joe" Heppert, Ph.D. Vice President for Research Texas Tech University, Chemistry

# **UAC - broad representation**

- Institutional Representatives- senior administrative leaders
- Health-related Institutions and Academic Campuses
- Active researchers CPRIT Scholars and funded investigators
- Regional representation



# UAC Meetings – Challenges of Post-Covid Era 2022 / 2023

## June 13, 2022 - Special Meeting to Discuss FY22/ FY23 Budget Adjustments

- a. FY22 Programmatic Update
- b. FY23 Budget Constraints

## March 31, 2023 – UAC Meeting to Discuss Recommendations for FY24 Adjustments to Academic Research and Recruitment Programs

- FY24.2 Academic Research RFAs
- Discuss current and proposed IIRA funding levels
- Discuss parameters for recruitment awards

## **Focus of Discussion**

- Recruitment Program
- Individual Investigator Research Awards (IIRA) Program

### June 13, 2022 UAC Meeting

### FY22 Academic Research Program Data Funding Information

Cycle	Mechanism	# Applications Submitted	Total Funding Requested	Applications Recommende d by SRC	Total Funding Recommended by SRC	Success Rate
22.1	Individual Investigator Research Awards (IIRA)	282	\$285,494,299	41	\$41,390,000	15%
22.1	IIRA for Children and Adolescents	50	\$67,884,165	7	\$9,730,000	14%
22.1	IIRA for Clinical Translation	27	\$52,079,326	1	\$1,990,000	4%
22.1	IIRA for System Computational Biology	21	\$23,825,931	3	\$3,570,000	14%
22.1	IIRA for Prevention and Early Detection	23	\$44,112,406	6	\$11,480,000	26%
<sup>1</sup> 22.1	IIRA Totals	403	\$473,396,127	58	\$68,160,000	
22.1	Recruitment of Established Investigators	17	\$92,670,539	8	\$47,999,721	47%
22.1	Recruitment of Rising Stars	15	\$55,999,661	9	\$31,999,661	60%
22.1	Recruitment of First-Time, Tenure Track FM	43	\$94,000,000	28	\$56,000,000	65%
22.1	Recruitment Totals	75	\$242,670,200	45	\$135,999,382	
	FY22.1 Totals	478	\$716,066,327	103	\$204,159,382	

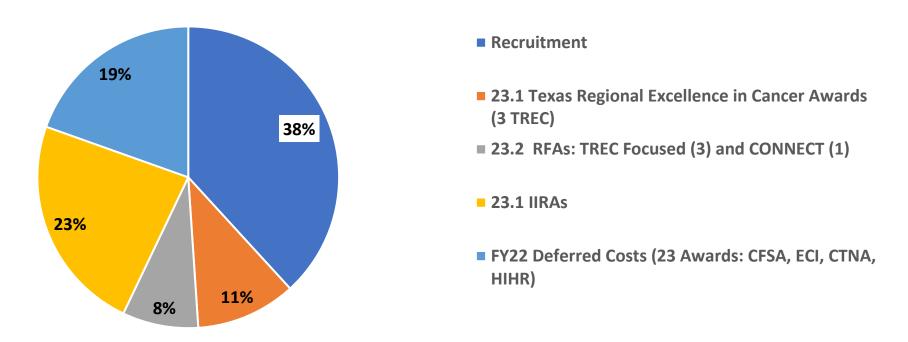
FY 22.2: The SRC recommended 29 applications totaling \$41,759,145 in requested funding. The Oversight Committee will review PIC recommendations in September with funding deferred to FY23 budget.

### Summary of FY23 measures implemented to align budget

- 1. Reduced recruitment cycles from 12 to 6 recommend fewer nominees (50-60% of previous years)
- 2. Reduced number of research awards funded 23.1 IIRAs, 329 grants received—reduced the payline from ~15 percentile to ~10 percentile
- 3. Did not post 23.2 RFAs (CFSA; High-Impact/High-Risk Awards). Considered bridge funding for Core renewals, as needed and with available funds
- 4. Preserved TREC program budget.

# March 31, 2023 - UAC Meeting





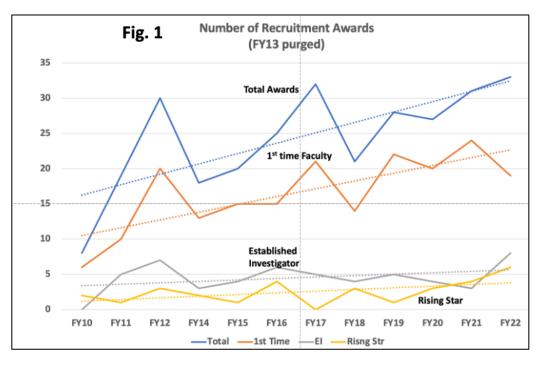
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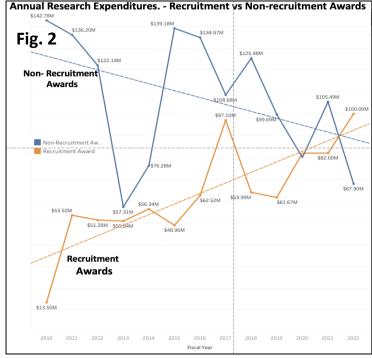
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# **CPRIT Scholars Program – A Jewel in the Crown of the Academic research Program**

## **Scholars Program**

- Unique Program building human capacity for cancer research across the State of Texas
- Targeting both outstanding new researchers and recognized leaders in cancer research Table I
- Major impact on cancer research programs in both health-related and academic institutions statewide
- Over last 13 years, steady increase in number of scholar awards, primarily in 1<sup>st</sup> Time recruiting awards Figure 1
- Increase expenditures in recruiting awards matched by a reciprocal decrease in research (non-recruiting) funding. Figure 2





#### TABLE I

	Mechanism Totals			
Mechanism	# App	#	Success	
	Sub.	Funded	Rate	
Recruitment Award Totals:	763	299	39%	
Recruitment of First-Time, Tenure-	452	202	45%	
Track Faculty Members	452	202	43%	
Recruitment of Established	158	58	37%	
Investigators	136	36	3/70	
Recruitment of Rising Stars	129	30	23%	
Recruitment of Missing Links	24	3	13%	

# **Options for Managing the Scholars Program**

## **Proposed**

- 1. Reinstate monthly cycles for FY24.
- 2. Allow an unlimited number of nominations to be submitted by each institution per cycle; smaller percentage of nominees (~30%) will be funded.
- 3. Reinstate the Rising Stars category

#### **Discussion and Recommendations**

- 1. Goal needs to be a balanced investment in recruitment versus research (non-recruitment) research program
- 2. Recognition that some form of cost containment is likely to be required to establish a balanced portfolio
- 3. Reinstate monthly application cycles
- 4. Reinstate the Rising Star category
- 5. 2-month review cycle would be manageable
- 6. Discussion of the impact of potential reductions in funding levels of REI and RRS awards. Recommended for further discussion (Table I)

#### **TABLE I**

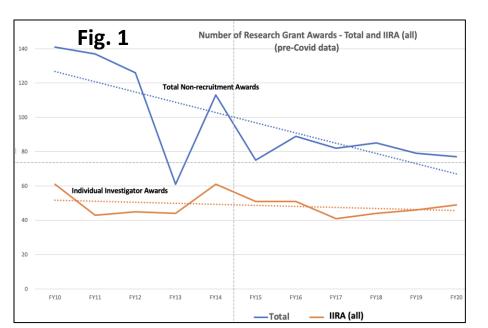
Mechanism	Current	Proposed
REI	\$6 million	\$5 million
RRS	\$4 million	\$3 million
FTTT	\$2 million	\$2 million

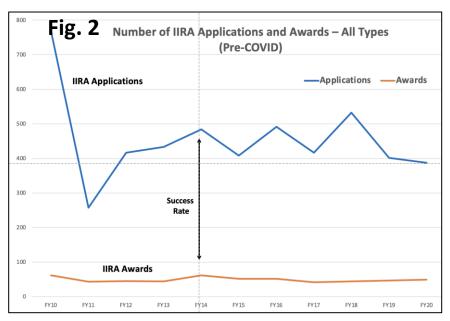
- 1. Discussion of initiating Institutional Caps based on either number of applications or total awards (based on size)
  - 1. Issue is prioritization of Excellence versus Distribution of Benefits
  - 2. Further discussion before considering implementation

# Individual Investigator Research Award (IIRA) Program A Second Jewel in the Crown of the Academic Research Program

## **Individual Investigator Research Award Program**

- The heart of the Academic Research Program. The engine that drives innovation and discovery
- Over the last 13 years, Texas' cancer researchers have submitted >5,500 research projects as applications for research funding. CPRIT has funded 650 individual projects. On average 300 400 investigators annually submit research project proposals.
- Over the last 10 years, while total number of research grant awards has declined, number of IIRA awards has remained constant. Figure 1
- IIRA projects are rigorously reviewed, <12%, only the most outstanding, are selected for funding. Figure 2</li>
- The IIRA supports both projects targeted to research areas selected as CPRIT strategic priorities as well as investigator-initiated projects across all areas of basic, translational and clinical cancer research. Table 1





#### TABLE I

FY2022				
	IIRA - Type	# App. Sub.	# Funded	Success Rate
	All Types	398	58	15%
Untargeted	Individual Investigator Research Awards	281	41	15%
Targeted	Individual Investigator Research Awards for Cancer in Children and Adolescents	49	7	14%
Targeted	Individual Investigator Research Awards for Clinical Translation	24	1	4%
Targeted	Individual Investigator Research Awards for Computational Biology	21	3	14%
Targeted	Individual Investigator Research Awards for Prevention and Early Detection	23	6	26%

# **Options for Managing the IIRA Program Funding**

## **Discussion and Recommendations - IIRA Funding**

- Historically the IIRA has achieved a stable level of funding approx. 11%. Table I
- Cycle 23.1 was anomalous with funding level <10%, and a gap of 25 projects (>\$28M) recommended for funding based on scientific merit, but not funded.
- It is a priority to maintain the Success Rate for IIRA proposals at least at historic levels , 11%-12% (Note: NCI currently at 12% with goal 15%).
- If necessary, modest reductions in amount and/or duration of awards may be necessary to maintain maintain success rates at acceptable levels. Table II
- Initiation of new research programs should be be viewed in the context of their potential impact on the Investigator Initiated Research Program.
- Explore opportunities for collaborative programs with other funding agencies with a shared interest in supporting Investigator-initiated cancer research (AACR, ASCO, SU2C etc.)

#### **TABLE I**

IIRA Success Rate (all mechanisms)				
	# App Sub.	# Funded	Success Rate	
New Submissions	5717	650	11.40%	
Resubmissions	593	100	16.90%	

#### **TABLE II**

Mechanism	Current Total/yr (No. years)	Proposed Total/yr (No. years)
Individual Investigator Research Awards (IIRA)	\$350,000/yr (3 yrs)	\$300,000/yr (3 yrs)
IIRA for Children and Adolescents	\$350,000/yr (4 yrs) \$500,000 w. trial	\$300,000/yr (4 yrs) \$400,000 w. trial
IIRA for Clinical Translation	\$500,000/yr (4 yrs)	\$400,000/yr (4 yrs)
IIRA for Computational Systems Biology	\$400,000/yr (3 yrs)	\$300,000/yr (3 yrs)
IIRA for Prevention and Early Detection	\$400,000/yr (5 yrs)	\$300,000/yr (4 yrs)

\* Total cost reduction for the 31 IIRAs in FY23 would be \$7.9 to \$8.9 million

# Communication in the Post-Covid Era

- Disruptions in CPRIT's Academic research grants awards program due to the unprecedent impact of the COVID have caused hardships in the academic community
- UAC recommends a vigorous program of outreach and communication to reassure the user community to CPRIT's ongoing commitment to the support of cancer-related research in Texas
  - Conferences and Information exchanges
  - Regional workshops and townhall meetings
  - Social media



# **The Value Proposition**

An Economic Assessment of the Cost of Cancer in Texas and the Benefits of the Cancer Prevention and Research Institute of Texas (CPRIT) and its Programs:

2022 Update

# THE PERRYMAN GROUP

Scientific research, as is facilitated by CPRIT, is valuable to society in large part due to the benefits that it facilitates downstream.

Basic medical research is part of society's essential infrastructure, and CPRIT has demonstrated capacity to enhance the health of Texans and the economy at a pace that far exceeds the direct investment.

# **Summary and Conclusions**

- The Covid catastrophe has provided an important opportunity to take stock of priorities and recalibrate existing programs as well as new programs to leverage the accomplishments of the last 14 years in charting a new course for the future.
- From UAC perspective, the Academic Research Program is a remarkable accomplishment a stable, valuable program supporting all aspects of cancer research in Texas.
- Academic Research Community, through the UAC, expresses its gratitude to the leadership of CPRIT for their support and the very inclusive approach they have taken to engage the opinion of key stakeholders in the research enterprise.

# **Thank You**