

# O Processo de comunicação dos astrônomos com o público **(o Modelo “linear”)**

Jorge Meléndez

AGA 0421

# Público-alvo

- Brasil 203 milhões
- Mundo 7,2 bi



# Divulgação do Júpiter gêmeo

Jornal Nacional:  $67000 \times 3 \times 24$  pontos  
= 4,8 mi grande São Paulo



Brasil > 20 milhões?



# Divulgação do Júpiter gêmeo

FOLHA DE S. PAULO

Mensageiro Sideral

De onde viemos, onde estamos e para onde vamos

## O primeiro exoplaneta brasileiro

POR SALVADOR NOGUEIRA

15/07/15 15:23



< 471

OUVIR O TEXTO

O ESO (Observatório Europeu do Sul) escolheu o dia seguinte à passagem da primeira espaçonave enviada da Terra por Plutão para anunciar a descoberta do primeiro exoplaneta brasileiro. Parabéns.



O GLOBO

## Descoberto planeta extrassolar 'gêmeo' de Júpiter

Na busca por uma 'Terra 2', equipe liderada por brasileiro identificou objeto na órbita de estrela parecida com nosso Sol

POR CESAR BAIMA

15/07/2015 11:00 / ATUALIZADO 15/07/2015 13:11

## Astrônomos brasileiros descobrem gêmeo de Júpiter orbitando gêmea do Sol

GALILEU

Busca por um Sistema Solar 2.0 acaba de ganhar um de seus mais promissores candidatos

16/07/2015 - 08H07 / ATUALIZADO 08H0707 / POR ANDRÉ JORGE DE OLIVEIRA

Facebook

buscar

ESTADÃO  
Ciência

## 'Novo Júpiter' dá pista para Terra 2.0

GIOVANA GIRARDI - O ESTADO DE S. PAULO  
15 Julho 2015 | 12h 36

Gêmeo do gigante do Sistema Solar orbita estrela parecida com o Sol, o que sugere a existência de um planetinha como o nosso

# Divulgação do Júpiter gêmeo



## Newly discovered Jupiter twin hints at new solar system similar to Earth's



By **Ben Brumfield**, CNN

🕒 Updated 1434 GMT (2134 HKT) July 16, 2015



## Jupiter's 'Twin' Found: Is This Solar System 2.0?



by **Elizabeth Howell**, Space.com Contributor | July 16, 2015 08:35am ET



### Encuentran gemelos de Júpiter y del Sol

Las posibilidades de encontrar un sistema planetario como el nuestro parecen cada vez más cercanas.

## Scoperto un gemello di Giove che ruota attorno al sosia del sole

**16/07/2015 - 15:35** - Un gemello di Giove orbita attorno a una stella simile al nostro sole. A scoprirlo è stato un team internazionale di astronomi utilizzando il telescopio da 3,6 metri dell'Eso. L'esopianeta si trova a una distanza dalla sua stella (HIP 11915) simile a ...

# Qual a origem das notícias científicas?

Social media (e.g. Instagram, Face, Twitter)

Press releases

Youtube channels

Announcements from scientific institutions

Scientists giving public talks

Press conferences

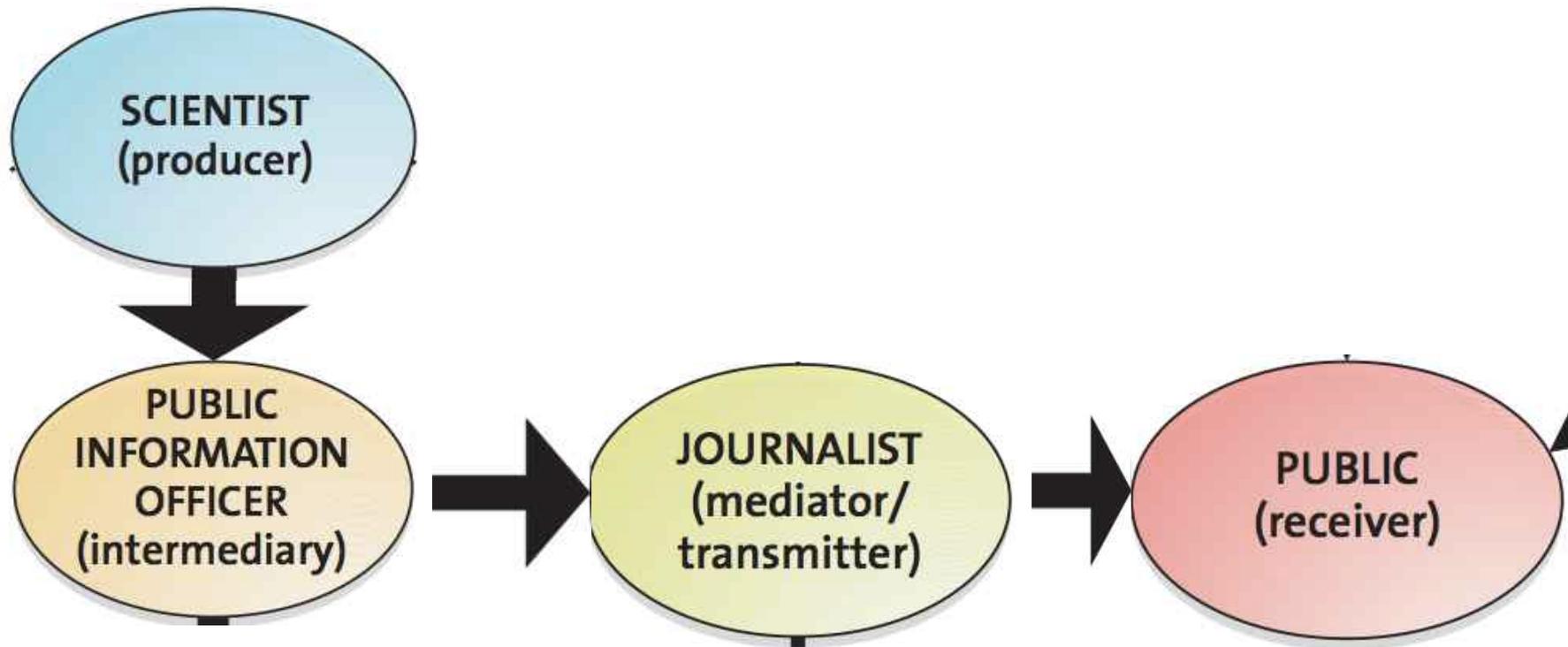
Scientists contacting journalists

Journalist attending scientific meetings

Science journalist reading arXiv

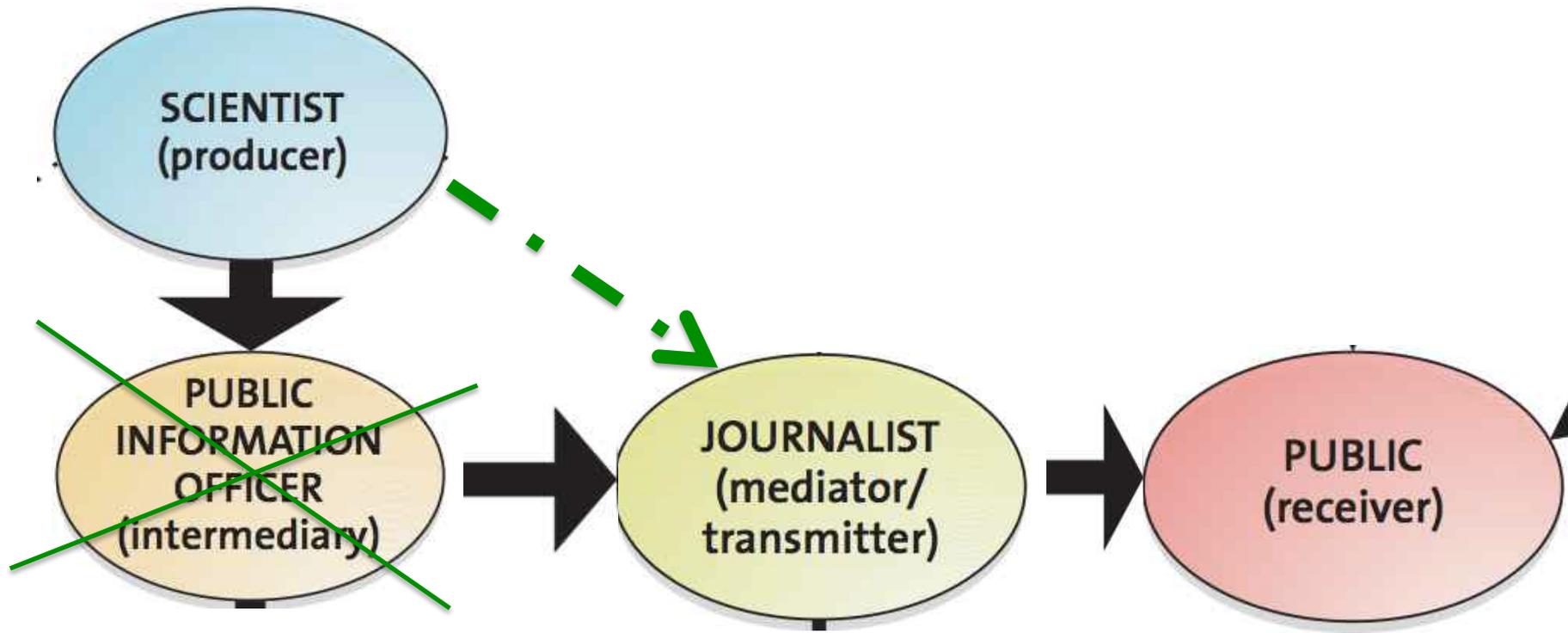
Journalists contacting scientists

# O Modelo linear (melhor custo/benefício?)

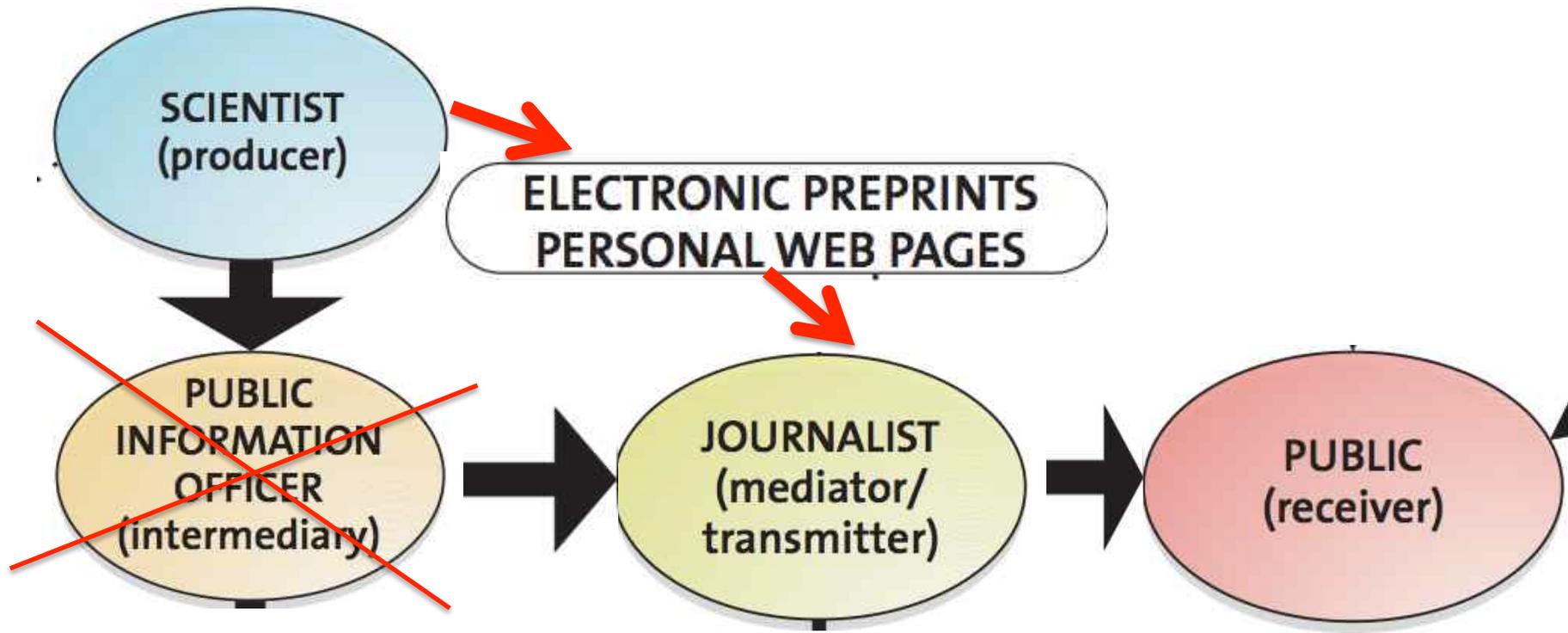


PIO: assessor de  
imprensa da instituição

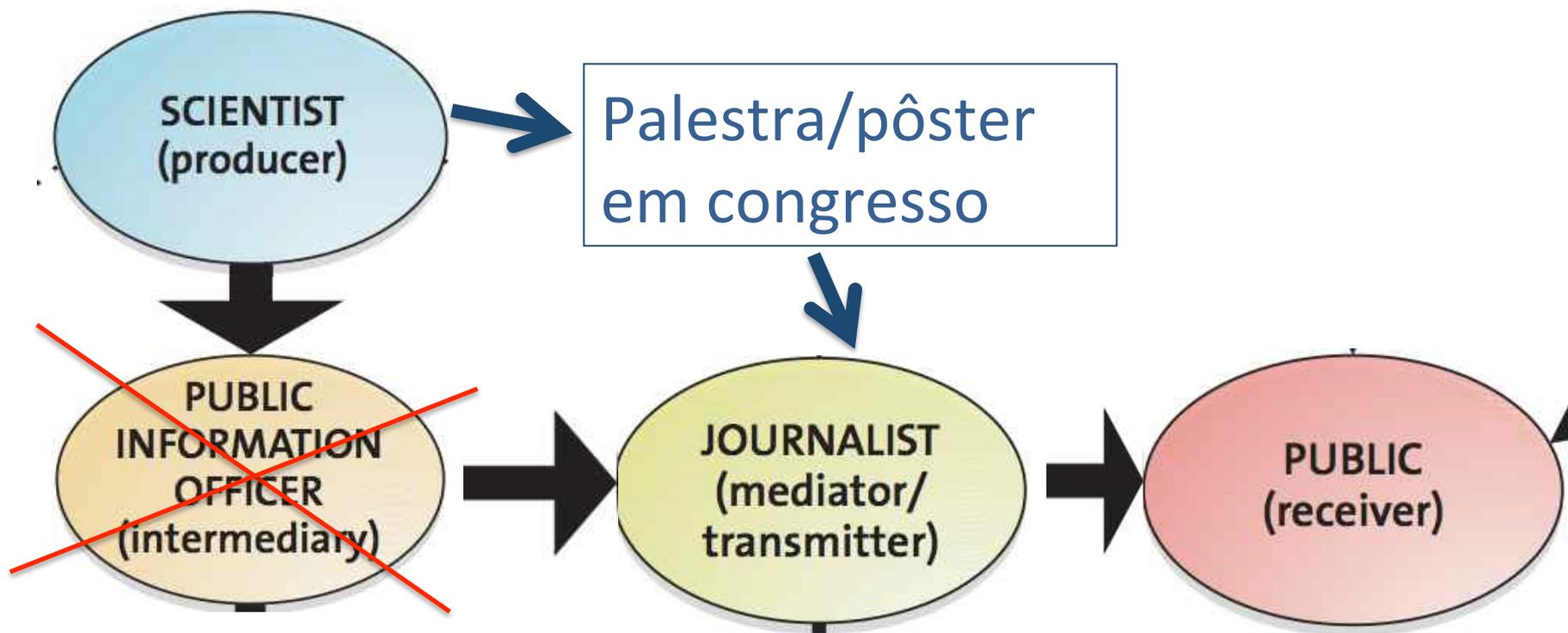
# Variações ao modelo linear: astrônomo contata diretamente a jornalista



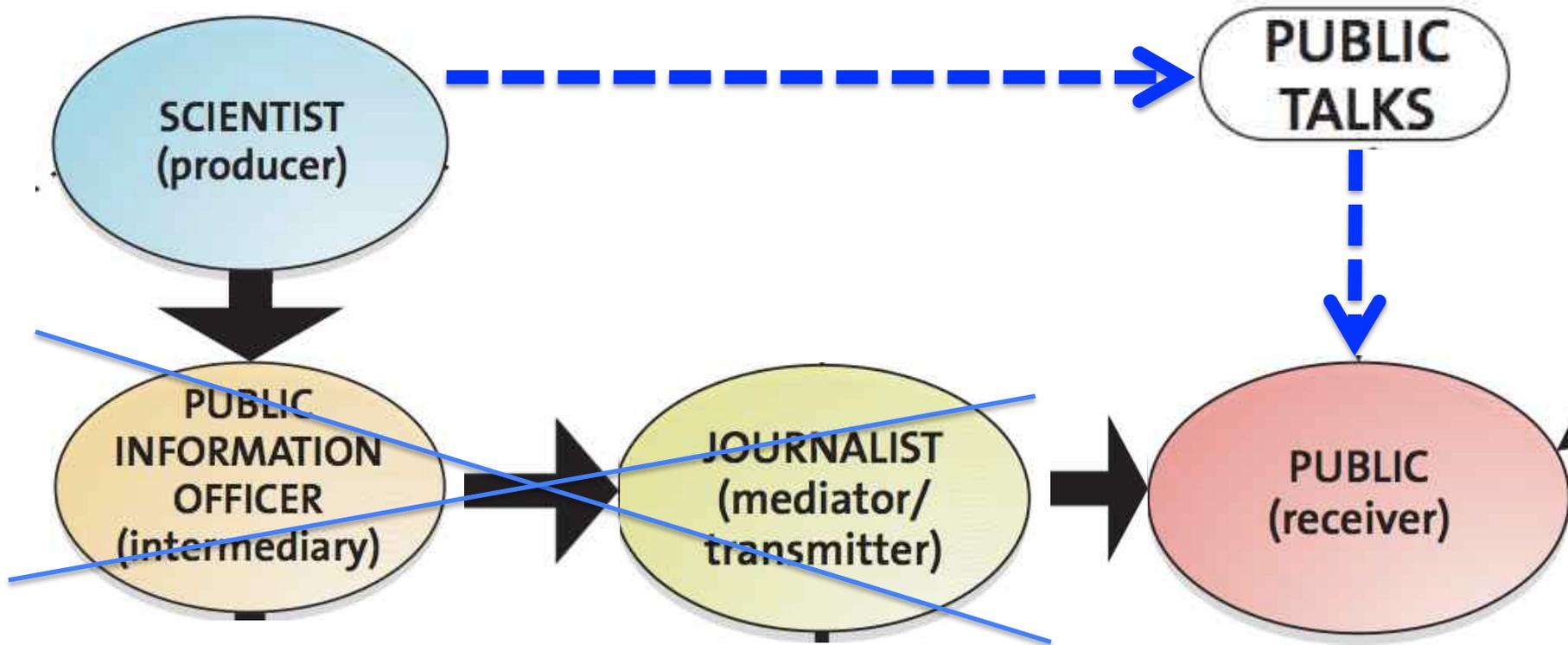
# Variações: astrônomo posta artigo no arXiv; jornalista se interessa no artigo



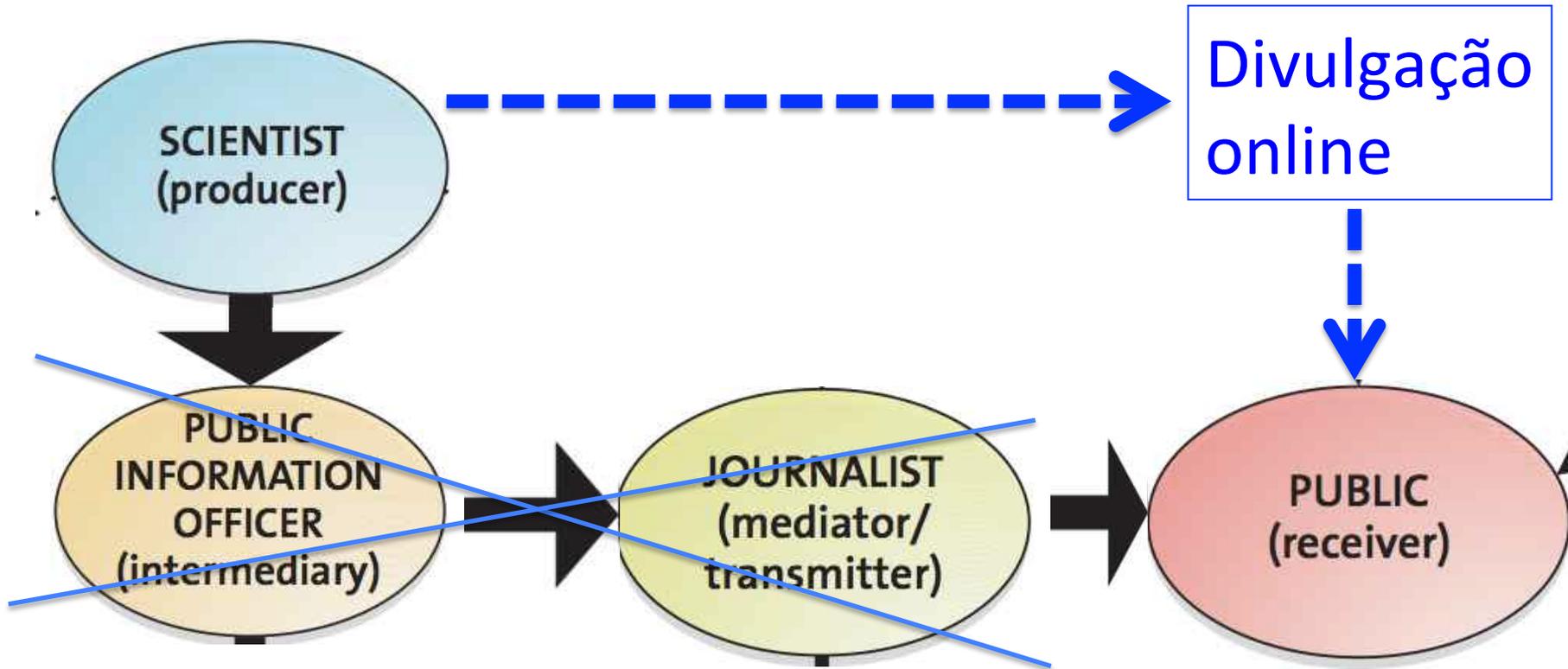
# Variações: astrônomo apresenta trabalho em congresso; jornalista se interessa na pesquisa



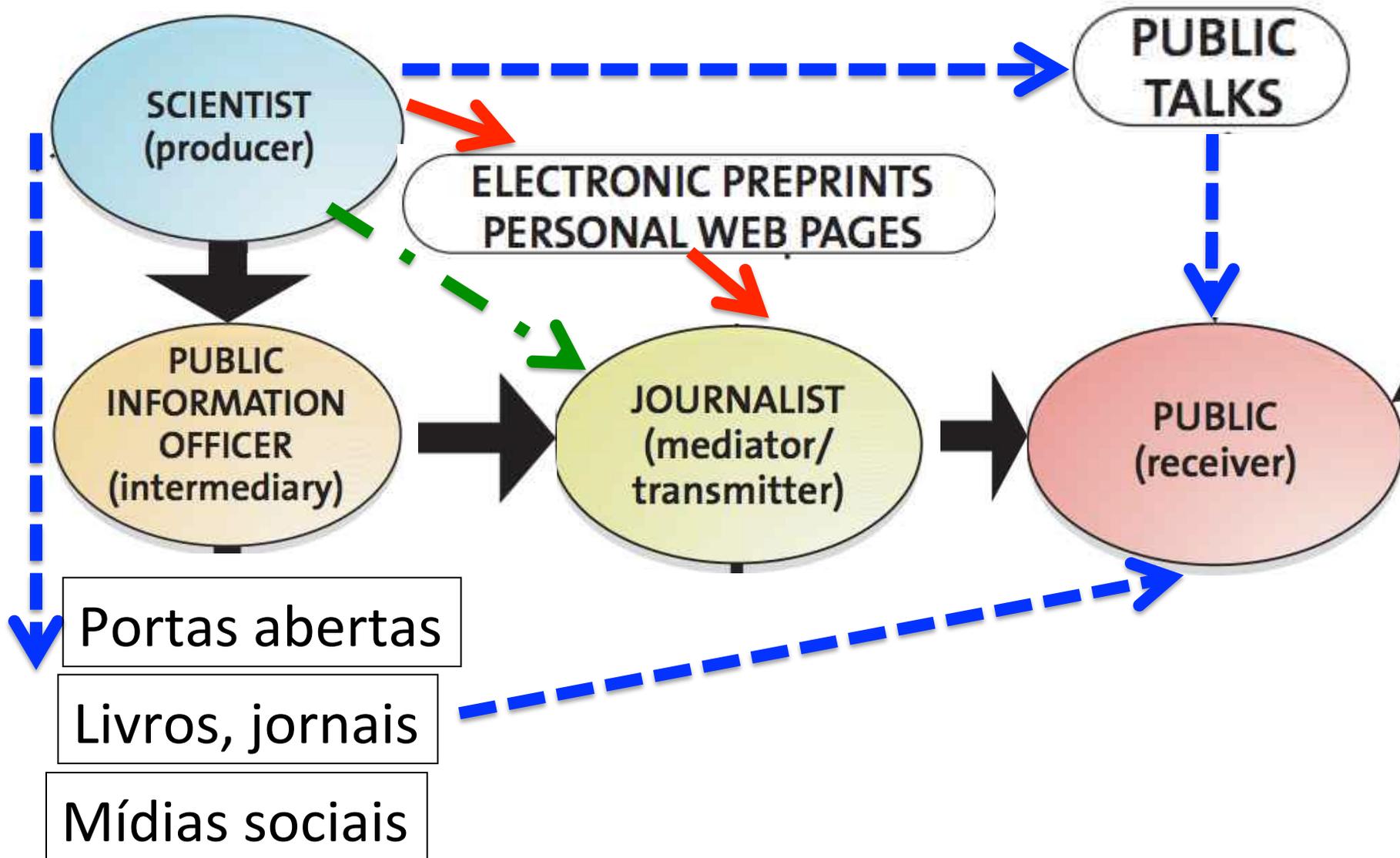
# Variações: astrônomo oferece palestra para o público



# Variações: astrônomo divulga diretamente a sua pesquisa (e.g. youtube)



# Existem diversas variações ao modelo linear



# O Modelo linear (melhor custo/benefício?)

## Vantagens:

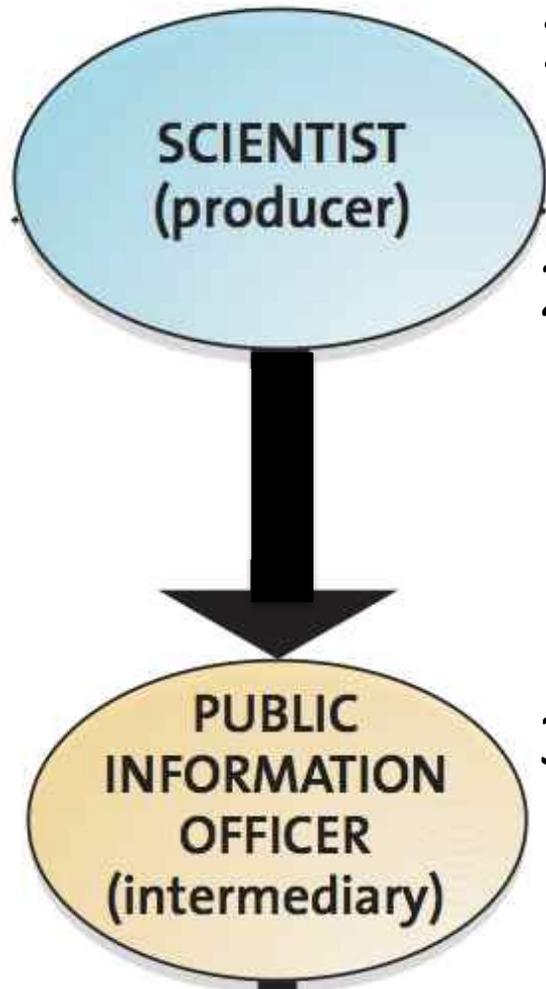
- menos tempo investido pelo cientista para o tamanho da audiência

## Desvantagens:

- Menos contato direto com o público



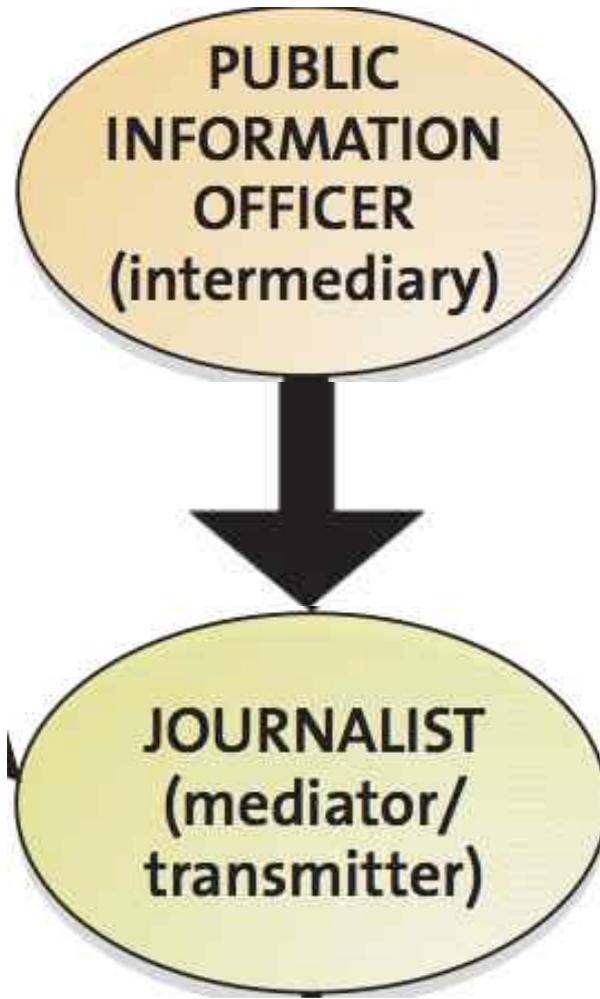
# O Modelo linear: do astrônomo ao PIO



1. Novos resultados → artigo → revista arbitrada (2 meses - 1 ano)
2. Astrônomo contata PIO após artigo ser aceito, explicando em termos simples a importância da pesquisa
3. PIO: julgar se o resultado é “interessante” (para o público) e se merece *press-release*

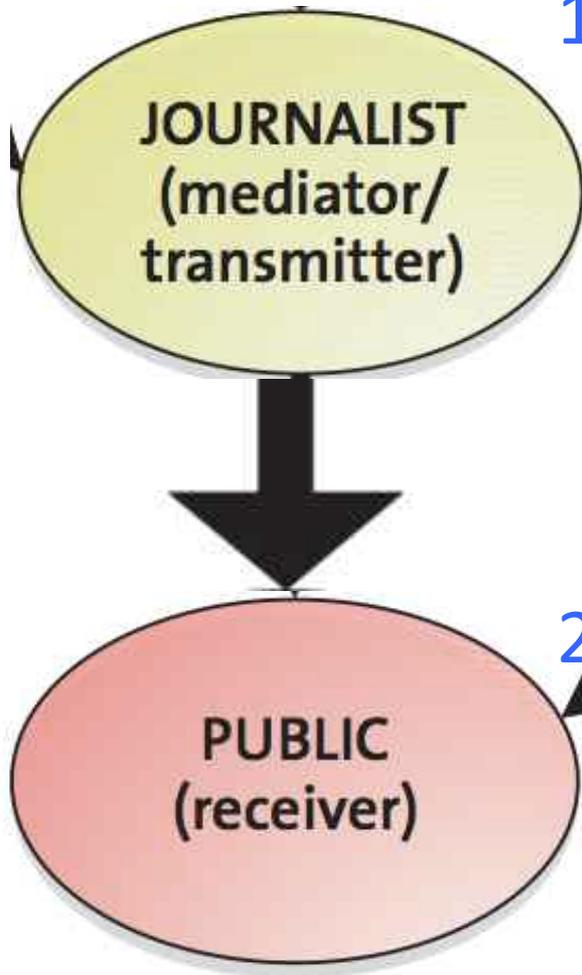
PIO: assessor de imprensa da instituição

# O Modelo linear: do PIO ao jornalista



1. Rascunho do *press-release* pelo PIO (em colaboração com cientista)
2. Release é aprovada pelo cientista
3. Em grandes organizações (p.ex. ESA), comitê revisará a *release* para avaliar conflitos científicos e políticos
4. A *press-release* será distribuída a jornalistas

# O Modelo linear: do jornalista ao público



1. **Jornalistas generalistas** (cobrem qq matéria) e **científicos** (especializados em ciência) podem usar o *release* como base para uma matéria, complementado com pesquisa sobre o assunto e entrevistas a cientistas.
2. **Jornalistas científicos** tem contatos bem estabelecidos com cientistas; também, tem menos chances de escreverem coisas erradas.

# O Contrato não escrito entre cientistas e o PIO

## Cientista fornece ao PIO

- Resultados relevantes
- Material de consulta
- Explicações
- Paciência
- Respostas rápidas
- Imagens e ideias para ilustrações
- Revisão do *press release*
- Disponibilidade para entrevistas na mídia

## PIO fornece ao cientista

- Apoio para promover a pesquisa do cientista
- Uma visão “outsider” do mais interessante do trabalho
- Texto do *press release*
- **Ilustrações do *release***
- Ampla distribuição na mídia (e outros)

# O Contrato não escrito entre PIO e jornalistas

## PIO fornece ao jornalista

- Boas histórias, realmente relevantes
- Resultados mais importantes
- **Ilustrações (arte)**
- *Falta de artistas gráficos na USP*
- Contato com cientistas
- Informação adicional (links, artigos, etc)
- Contínuo fluxo de boas histórias

## Jornalista fornece ao PIO

- Visibilidade da ciência para o público
- Publicidade sobre o projeto e a instituição
- Ampla distribuição dos resultados

# O Contrato não escrito entre jornalistas e o público

## Jornalista fornece ao público

- Excelentes matérias
- Seleção dos resultados mais importantes
- **Bons ou excelentes ilustrações e vídeos**
- *Falta de artistas gráficos na USP*
- Matérias divulgadas rapidamente

## Público fornece ao jornalista

- “Pagamento” (e.g. assinatura de jornal, ou ler/assistir/escutar propaganda no jornal, site, tv, rádio)
- Fidelidade

# Potenciais conflitos entre cientistas e jornalistas

Journalists and scientists often operate at opposite ends of the communication spectrum. As Treise & Weigold (2002) express it:

*“... scientists are frequently disappointed or angry about media coverage of their research, their fields, or science generally. Journalists report frustration with the difficulties of describing and understanding important scientific findings and with the low levels of support provided by their news organisations for reporting on science news”.*

# Devemos compreender que cientistas e jornalistas às vezes valorizam aspectos diferentes

<b>Scientist</b>	<b>PIO</b> Public information officer	<b>Journalist</b>
Values advanced knowledge Porem deveria saber como se insere no contexto geral	Uses the advanced knowledge in a broad context	Values diffuse knowledge
Values technical language	Reshapes technical language into simple language	Values simple language
Values near certain information	Uses facts, but also more speculative indications to give perspective	Values indications
Values quantitative information	Balances facts with emotional and personal accounts	Values qualitative information

# Devemos compreender que cientistas e jornalistas às vezes valorizam aspectos diferentes

Scientist	PIO	Journalist
Values near complete information	“Cuts through” when the results are trustworthy, but perhaps still not complete	Values incomplete information
Values narrow information	Uses the frontline narrow science to open doors to the broader context	Values comprehensive broad spectrum information
Specialist in his/her area	Specialist in communicating science to the general public	Generalist
Tem uma boa base teórica	Understands theory and applies it in the real world context	Pragmatist

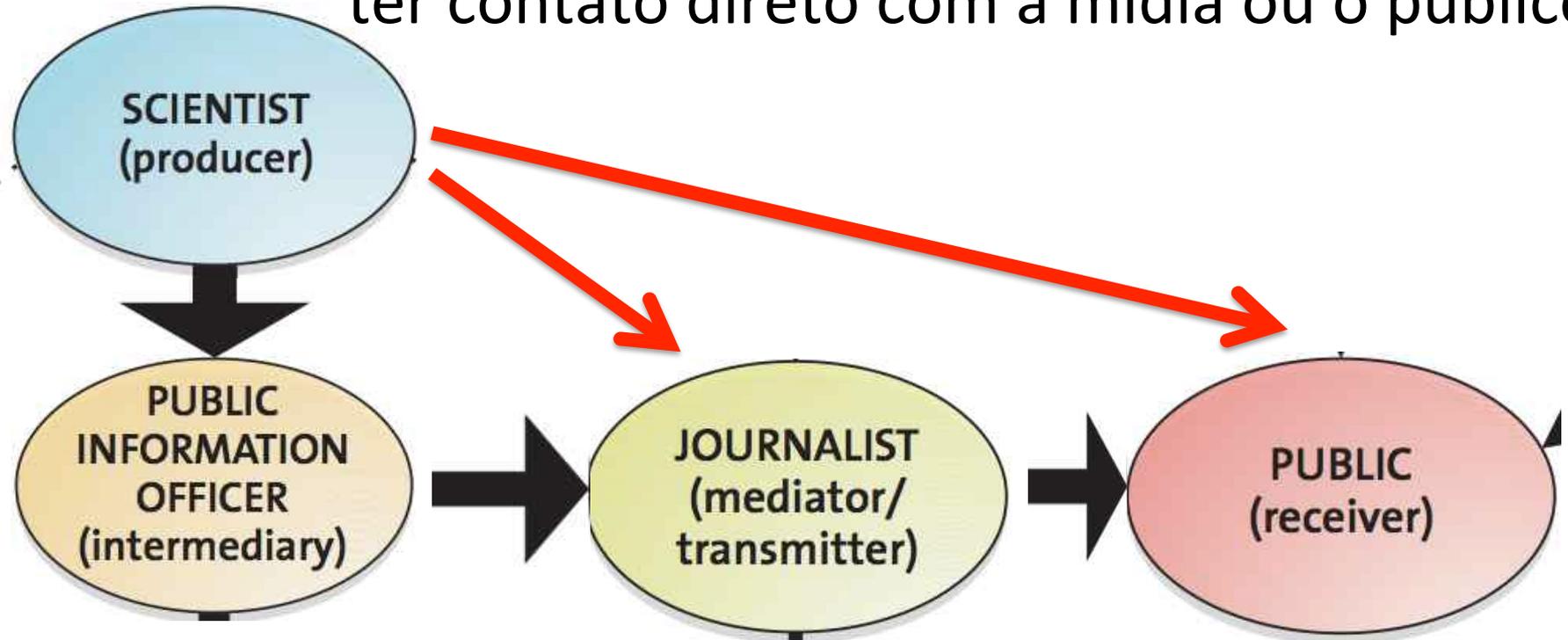
# Devemos compreender que cientistas e jornalistas às vezes valorizam aspectos diferentes

<b>Scientist</b>	<b>PIO</b>	<b>Journalist</b>
Values knowledge for knowledge's sake	Focuses on the knowledge that is relevant to society	Focuses on what is relevant to society
Is cumulative	Is very picky with which information to accumulate	Is non-cumulative
Is slow	Can develop stories over long time, but always delivers on time	Is fast
Enjoys high professional status	Respects all other actors	Is in the lower ranks of professional status

# O modelo linear no Brasil

Na prática, o modelo é difícil de ser aplicado no Brasil devido à falta de PIOs ou de pouco apoio aos PIOs

Mesmo contando com o PIO, às vezes o cientista pode ter contato direto com a mídia ou o público

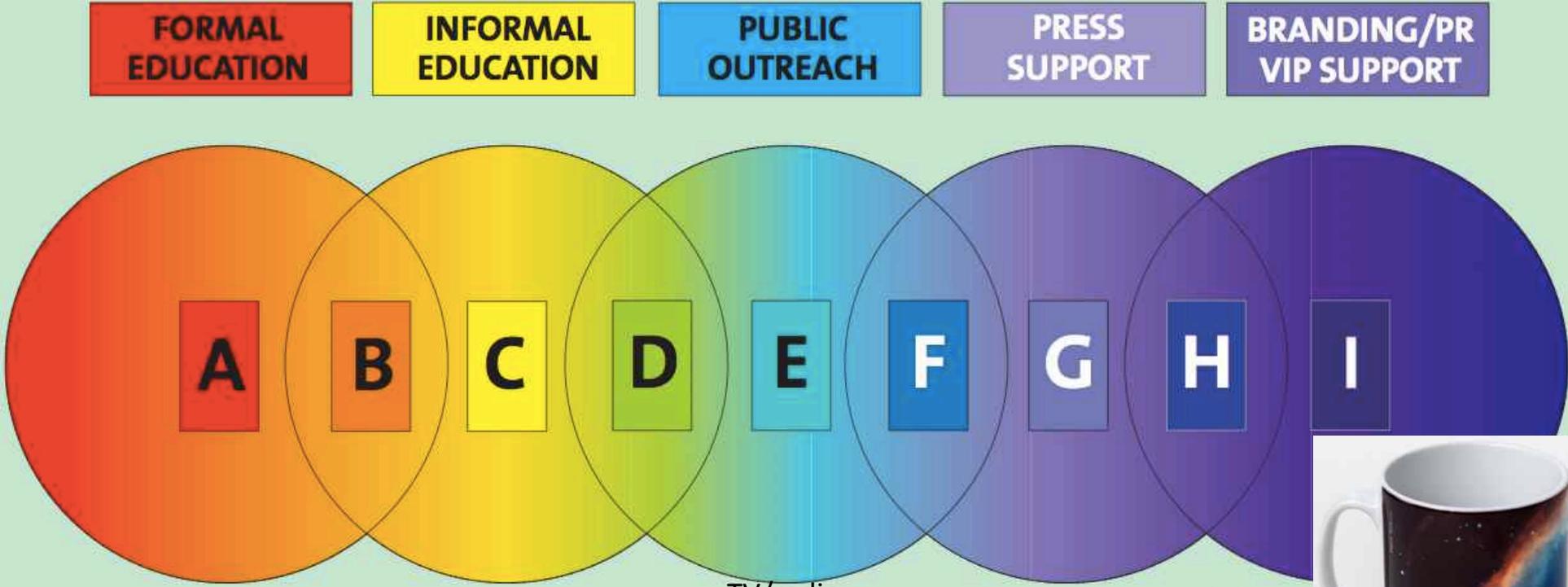


***Public Information Officers (PIO)*** trabalham na ***Education and Public Outreach (EPO) Office***, conhecida no Brasil como **Setor** (ou assessoria) **de Comunicação** ou **Setor** (ou assessoria) **de Imprensa.**

Também pode ser junto ou separado com a Extensão Universitária



# Possíveis atividades da *Education & Public Outreach office*



Curriculum-driven: textbooks, teacher training, undergrad courses ...

Educational programmes at planetaria, museums, libraries, parks ...

Museum exhibits, observing trips (eclipses, comets ...), star parties ...

Planetarium shows, IMAX movies, public talks, hands-on demos ...

TV/radio documentaries, podcasts, magazine articles, popular books, webchats, weblogs, cultural/scientific events, DVDs ...

Photo releases, popular brochures ...

Press releases, press conferences, press kits, media interviews, media courses for scientists ...

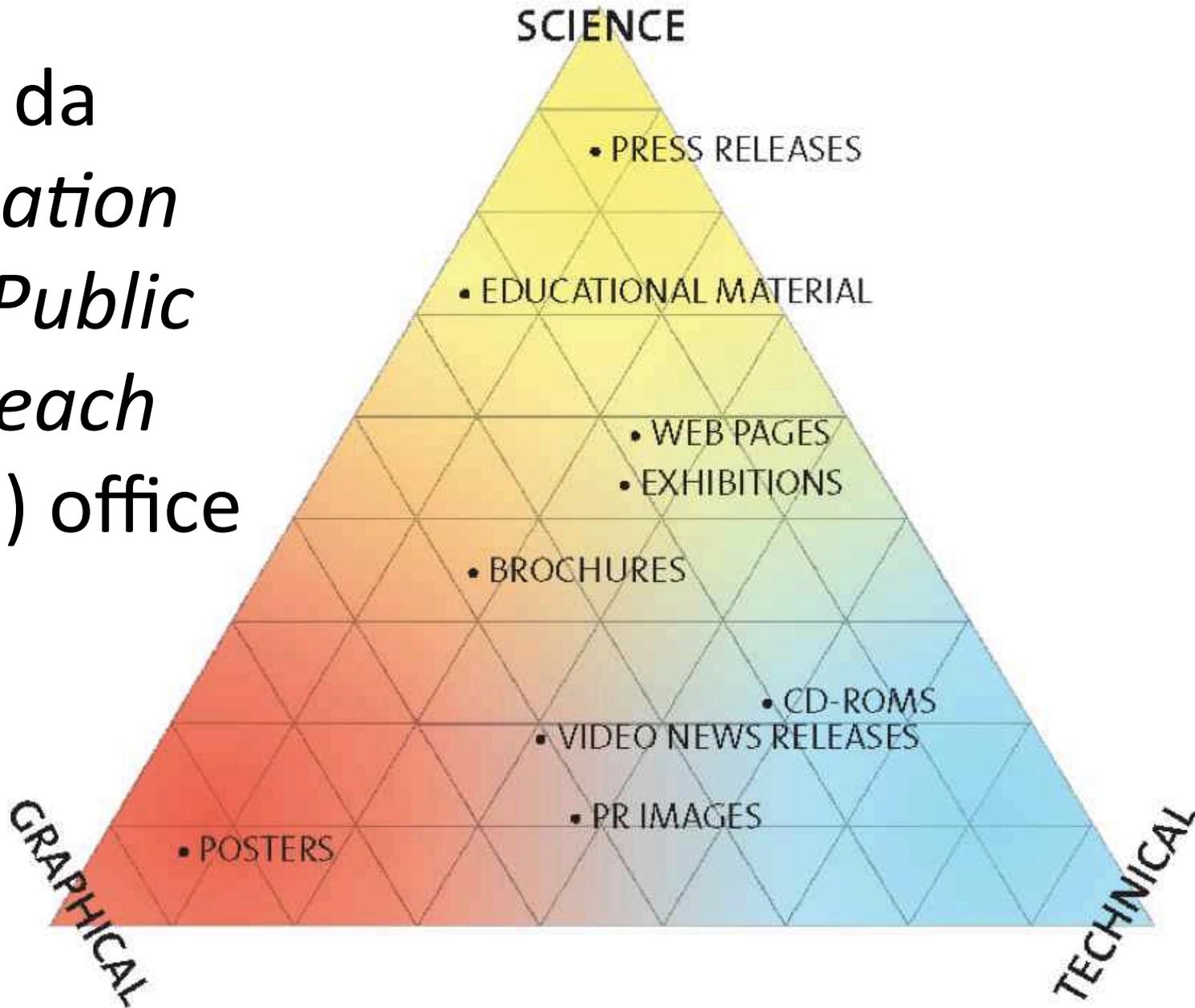
Exhibition booths, technical brochures, newsletters, annual reports, posters, postcards ...



Mercadorias: pins, stickers, caps, t-shirts, bookmarks, mugs ...

SCIENCE

Staff da  
*Education  
and Public  
Outreach*  
(EPO) office



## Staff, *Education and Public Outreach* (EPO) office

- Coordinator
- **Must: Public information Officer** (likely a journalist)
- Graphic designer
- Press officer (web e contato direto com a mídia)
- Educator
- Internal communicator (newsletters, reports, take care of visits)
- Technical communicator (webmaster, etc)
- Editor, proof reader
- Secretary



European Southern Observatory

Após a NASA, o mais importante centro de Divulgação

# Equipe de divulgação e ensino do ESO

## Head of education and Public Outreach

Lars Lindberg Christensen (chefe da equipe)

Head of ePOD

Lars is a science communication specialist heading the ESO-Hubble outreach group in Munich, Germany, where he is responsible for public outreach and education for VLT, La Silla, ALMA, ELT, and ESA's part of the Hubble Space Telescope.

Email: [lars@eso.org](mailto:lars@eso.org)

Tel: +49 89 3200 6761

### Objectives

1. Management and coordination of ESO's EPO efforts
2. Setting the strategic goals of the EPO work
3. Implementation of the EPO Strategy and optimising its return



Raquel Yumi Shida  
Web Content Coordinator



Mathias Andre  
Web & Advanced Projects Coordinator



Calum Turner  
Public Information Officer



Mariya Lyubenova  
Astronomer



Jutta Boxheimer  
Print Coordinator



Mafalda Martins  
Print Assistant



# Equipe de *Education and Public Outreach* do ESO



## Susana Almagro Garcia

Administrative Assistant

Email: [salmagro@eso.org](mailto:salmagro@eso.org)

Tel: +49 89 3200 6291

## Administrative Assistant

### Objectives

1. Administrative, Procurement and Budget Support
2. Travel Logistics and Internships Support
3. Events and Project Coordination



Calum Turner

Public Information Officer

Mariya Lyubenova

Astronomer



Mathias Andre

Web & Advanced Projects Coordinator



Raquel Yumi Shida

Web Content Coordinator



ESO-Hubble outreach group in Munich, and education for VLT, La Silla, ALMA, ELT, and

1. Management and coordination of ESO's outreach efforts
2. Setting the strategic goals for the EPO work
3. Implementation of the EPO Strategy and optimising its return-on-investment



# Equipe de *Education and Public Outreach* do ESO



## Media Relations, Press Releases

Calum Turner

Public Information Officer

Calum received an MPhys in astrophysics from The University of Edinburgh, but wasn't keen on becoming an astronomer. Instead, he has a growing experience of science journalism and science communication. He has worked with the Royal Observatory Edinburgh Visitor Centre, Edinburgh International Science Festival, and the Astronomy for Remote and Island Schools project, and spent much of his degree bringing astronomy to learners from all over Scotland.



WORK: coordination/ implementation of outreach projects, writing of press releases, web pages, announcements, ESOcasts

### Public Outreach

en

Communication specialist heading ESO-Hubble outreach group in Munich, responsible for public outreach and education for VLT, La Silla, ALMA, ELT, and the future Telescope.

Email: [lars@eso.org](mailto:lars@eso.org)  
Tel: +49 89 3200 6761

#### Objectives

1. Management and coordination of ESO's EPO efforts
2. Setting the strategic goals for the EPO work
3. Implementation of the EPO Strategy and optimising its return-on-investment



Susana Almagro Garcia

Administrative Assistant



Mariya Lyubenova

Astronomer



Mathias Andre

Web & Advanced Projects Coordinator



Raquel Yumi Shida

Web Content Coordinator



# Equipe de *Education and Public Outreach* do ESO



## Astrônoma

Mariya Lyubenova

Astronomer



### Objectives

- Science liaison: scientific quality assurance
- Astronomical image production coordination
- ESO Science Outreach Network coordination

Mariya holds a doctorate in astronomy from the Ludwig-Maximilians-Universität after pursuing 3 years of research at the Headquarters of ESO in Germany. In her work, she observes and uses the motions and chemical properties of stars in galaxies as fossil records to unravel the build-up and evolution of galaxies.

Hubble outreach group in Munich, education for VLT, La Silla, ALMA, ELT, and



1. Management and coordination of ESO's EPO Strategy
2. Setting the strategic goals for the EPO work
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Susana Almagro Garcia

Administrative Assistant



Calum Turner

Public Information Officer



Mathias Andre

Web & Advanced Projects Coordinator



Raquel Yumi Shida

Web Content Coordinator





## Objectives

## Suporte avançado de informática (inclusive software para imagens)

1. Development and implementation of our EPO media archive system
2. Development of other technical science communication infrastructure
3. Development of outreach image processing tools

### Mathias Andre

Web & Advanced Projects Coordinator

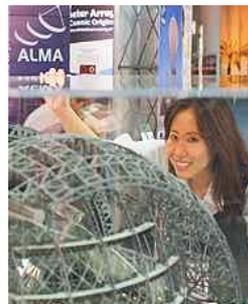
Mathias obtained a MSc in Computer Science in England and worked for several years as a Unix system administrator and IT Operations Manager before joining the ESO outreach group to tackle new challenges as Web and Advanced Projects Coordinator.



Calum Turner

Public Information Officer

Susana Almagro Garcia  
Administrative Assistant



Raquel Yumi Shida

Web Content Coordinator



# Equipe de *Education and Public Outreach* do ESO



## Conteúdo Web

### Objectives

1. Updating, maintenance, design and development of web sites
2. Developing, organizing and publishing web content



Raquel Yumi Shida

Web Content Coordinator

Raquel obtained a professional degree in architecture and urban planning at the University of São Paulo in Brazil, her home country. As an undergraduate student, she also took classes in various fields of science and became an avid amateur astronomer, publishing data and articles on galactic and extragalactic stars. Since then she has worked at the Astronomy Department at the University of São Paulo, at NASA/STScI and at ESA/Hubble, doing both scientific research and astronomy outreach. Today she is responsible for creating visual and textual content and managing several websites for ESO, IAU and ESA/Hubble.

Education and Public Outreach

Christensen

Communication specialist heading ESO-Hubble outreach group in Munich. He is responsible for public outreach and education for VLT, La Silla, ALMA, ELT, and Hubble Space Telescope.

761

Coordination of ESO's EPO efforts and strategic goals for the EPO work on the EPO Strategy and optimising its return-on-investment



Calum Turner  
Public Information Officer

Susana Almagro Garcia  
Administrative Assistant



Mathias Andre  
Web & Advanced Projects Coordinator



## Coordenadora de Publicações impressas



**Jutta Boxheimer**

Print Coordinator

Email: [jboxheim@eso.org](mailto:jboxheim@eso.org)

Objectives

1. Print Design Coordination, Visual identity oversight
2. Layout of print products



**Calum Turner**  
Public Information Officer

**Susana Almagro Garcia**  
Administrative Assistant



**Mathias Andre**  
Web & Advanced Projects Coordinator



**Raquel Yumi Shida**  
Web Content Coordinator

### Education and Public Outreach

Christensen

Communication specialist heading ESO-Hubble outreach group in Munich, he is responsible for public outreach and education for VLT, La Silla, ALMA, ELT, and Hubble Space Telescope.

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Management and coordination of ESO's EPO efforts to achieve strategic goals for the EPO work and the implementation of the EPO Strategy and optimising its return-on-investment.





## Assistente de publicações impressas

Mafalda Martins

Print Assistant

### Objectives

1. Print layout assistance
2. General graphics: posters, illustrations etc.

#### Head of education and Public Outreach

Lars Lindberg Christensen  
Head of ePOO

Lars is a science communication specialist heading ESO-Hubble outreach group in Munich, Germany, where he is responsible for public outreach and education for VLT, La Silla, ALMA, ELT, and ESA's part of the Hubble Space Telescope.

Email: [lars@eso.org](mailto:lars@eso.org)  
Tel: +49 89 3200 6761

#### Objectives

1. Management and coordination of ESO's EPO efforts
2. Setting the strategic goals for the EPO work
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Calum Turner  
Public Information Officer

Susana Almagro Garcia  
Administrative Assistant



Mathias Andre  
Web & Advanced Projects Coordinator



Raquel Yumi Shida  
Web Content Coordinator



## Animações / Gráficos



Martin Kornmesser

Animations/Graphics Coordinator

### Objectives

1. Graphical image processing
2. 2D and 3D modelling and animation
3. Misc. motion and still graphics: video editing, encoding, web design



Calum Turner  
Public Information Officer

Susana Almagro Garcia  
Administrative Assistant



Mathias Andre  
Web & Advanced Projects Coordinator



Raquel Yumi Shida  
Web Content Coordinator



# Equipe de *Education and Public Outreach* do ESO



## Coordenador de vídeo

**Herbert Zodet**

Video Coordinator

1. Production of video material for broadcast, online and DVD use
2. Maintenance of the online/offline video archive
3. Writing of audiovisual scripts

Worked in Munich,  
Chile, ALMA, ELT, and



**Calum Turner**  
Public Information Officer

**Susana Almagro Garcia**  
Administrative Assistant



**Mathias Andre**  
Web & Advanced Projects Coordinator



**Raquel Yumi Shida**  
Web Content Coordinator





## Assistente de animações e ilustrações

### Objectives

1. Artist's impressions
2. 3D modelling and rendering
3. General graphics: posters, illustrations etc.

Luis Calçada

Animations Assistant

He studied Physics/Applied Math (Astronomy) but eventually gave up on the idea of becoming a real scientist. Got his first real job on a science centre in Portugal, where for 6 years he's discovered, developed and matured his skills in visual science communication. At ESO he's part of the latter steps of the chain, in a group which tries to deliver to the public the extraordinary science there developed in the exciting and inspiring manner it deserves. His tools of choice are Maxon's Cinema 4D, Adobe's Photoshop and After Effects and a Wacom Intuos 3. When he has the time, he also likes to do some photography, a sample of which you can see on his flickr page

alist heading ESO-Hubble outreach group in Munich,  
blic outreach and education for VLT, La Silla, ALMA, ELT, and  
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Calum Turner

Public Information Officer

Susana Almagro Garcia  
Administrative Assistant



Mathias Andre

Web & Advanced Projects Coordinator



Raquel Yumi Shida

Web Content Coordinator



# Equipe de *Education and Public Outreach* do ESO



## ESO Supernova

## Coordenadora do ESO Supernova

Tania Johnston

Supernova Coordinator

Tania grew up in the North-East of Scotland, where her love of astronomy started at an early age, thanks to the wonderful dark skies there. Tania obtained a Masters in Chemistry from Southampton, England, before beginning her career in science communication. She has experience creating and delivering hands-on workshops and talks on a variety of scientific topics, to a wide range of audiences. Tania has developed curriculum related educational material and worked closely with the Physics teaching community in Scotland to support the use of astronomy as a context for teaching science at all levels. In 2012, she received a Winston Churchill Travelling Fellowship, which allowed her to travel to Chile to visit some of ESO's large telescopes, to expand her understanding of these facilities and further enhance her abilities communicating astronomy to the public. You can read about her trip in her blog here <http://bigtelescopes.blogspot.de/>



Calum Turner  
Public Information Officer

Susana Almagro Garcia  
Administrative Assistant



Mathias Andre  
Web & Advanced Projects Coordinator



Raquel Yumi Shida  
Web Content Coordinator



<https://supernova.eso.org/>

# Bringing ESO's telescopes from Chile to you

Free admission

## OPENING HOURS

Mon	Closed
Tue	Closed
Wed	09:00 - 17:00
Thu	09:00 - 17:00
Fri	09:00 - 17:00
Sat	12:00 - 17:00
Sun	12:00 - 17:00

A New Supernova over Munich



## Interns

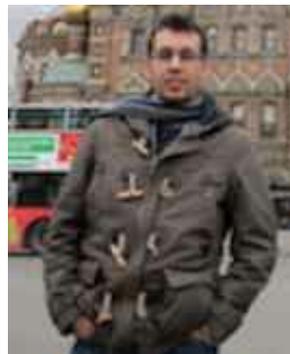
### Álvaro Caseiro de Almeida

Outreach Trainee

Álvaro holds an MSc degree in Physics and a Ph.D. in Physical Engineering, both from the University of Aveiro, in Portugal, where he was born. In the last years, he has also been devoting significant time to science education and communication, taking science to schools, to the general public and organising scientific events of various types.

In 2013 and 2015 respectively, he participated in the foundation of the first Student Chapter of The Optical Society and in the foundation of the first Young Minds Section of the European Physical Society, both in Portugal.

He is also an amateur journalist. Astronomy and science management and communication are his current main interests.



## Estagiário de PIO

in Munich,  
la, ALMA, ELT, and



Calum Turner  
Public Information Officer

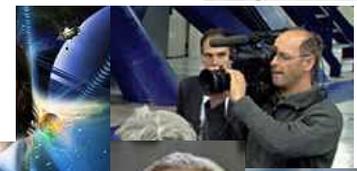
Susana Almagro Garcia  
Administrative Assistant



Mathias Andre  
Web & Advanced Projects Coordinator



Raquel Yumi Shida  
Web Content Coordinator



# Equipe de *Education and Public Outreach* do ESO



ESO — Reaching New Heights in Astronomy



## Ivana Kurečić

Intern Science Communication

Ivana is a quantum physicist with a nagging interest in finding the amusing parts in stories of scientific research. She joins the ESO ePOD team while on leave from her doctoral studies in quantum information theory at the Max Planck Institute of Quantum Optics (which is right across the street from her current office).

During her studies, Ivana took up many projects aimed to communicate science and lessen the gap between researchers and the general public, but she also worked with professional organizations such as the International Association of Physics Students — as the editor-in-chief of the students' journal and the main organizer of the International Conference of Physics Students in Zagreb. She holds an MSc in Physics from the University of Zagreb, a high school degree in music theory, and an urge to tell you about science you'll love.

You can find Ivana's personal website at [happyturtlethings.net](http://happyturtlethings.net) and her Twitter account [@Turtle\\_Things](https://twitter.com/Turtle_Things).



**Calum Turner**  
Public Information Officer

**Susana Almagro Garcia**  
Administrative Assistant



**Mathias Andre**  
Web & Advanced Projects Coordinator



**Raquel Yumi Shida**  
Web Content Coordinator



# Equipe de *Education and Public Outreach* do ESO



ESO — Reaching New Heights in Astronomy



## Sara Rigby

Intern Science Communication



## Estagiária de PIO

Sara has always been fascinated with science, and especially physics. She decided years before starting her degree that she would get a PhD, and then go on to a career in research. Whilst studying for an MPhys in Mathematical Physics at the University of Edinburgh, she realised that she much preferred telling other people about science instead. So, she started to volunteer for the science outreach programme at the University of Edinburgh, known as Sci-Fun Roadshow, and later began to write for the university newspaper, The Student, in the Science and Technology pages. After discovering that she definitely didn't want to go into teaching, Sara got the chance to do work experience at BBC Science Focus Magazine. Since then, she has graduated and become even more set on a career in science communication.

LT, and



**Calum Turner**  
Public Information Officer

**Susana Almagro Garcia**  
Administrative Assistant



**Mathias Andre**  
Web & Advanced Projects Coordinator



**Raquel Yumi Shida**  
Web Content Coordinator





## ePOD no Chile, tradução de press releases, contatos com a imprensa, encarregados de visitas, etc.

### ePOD Chile

#### Francisco Rodriguez

Chile Press Officer

Francisco is the Press Officer of ESO in Chile. A 2006, he worked for six years in print media, fir the newspaper *La Tercera*, one of the most imp wrote about science, technology, education an various international conferences for science joi where he specialised in issues such as epidemi problems.

#### Mylène Andre

Chile Outreach Officer

#### Laura Ventura

Team Leader in Chile

A graduate in Astronomy, Laura has worked in Outreach and Education at world-class astronomical observatories since 2001. She joined ESO in 2006. Since then, she has attended more than 150 visits to Paranal, ALMA and La Silla observatories, developing an extensive experience in supporting media and VIPs at the sites. Laura was recently appointed as Interim Team Leader of ESO education and Public Outreach Department in Chile. Before ESO, she worked for almost four years on the development of educational and outreach contents at the "Director's Cabinet" of the Astrophysics Institute of Canary Islands (IAC), Spain. She studied at the Faculties of Physics of the University of Padua (Italy) and the University of La Laguna (Tenerife, Spain), from 1994 to 1999. She did a post-graduate research work on stellar populations in dwarf galaxies of the Local Group at the Astrophysics Institute of Canary Islands (IAC), her alma mater.



# ESO Science Outreach Network



European  
Southern  
Observatory

ESO — Reaching New Heights in Astronomy

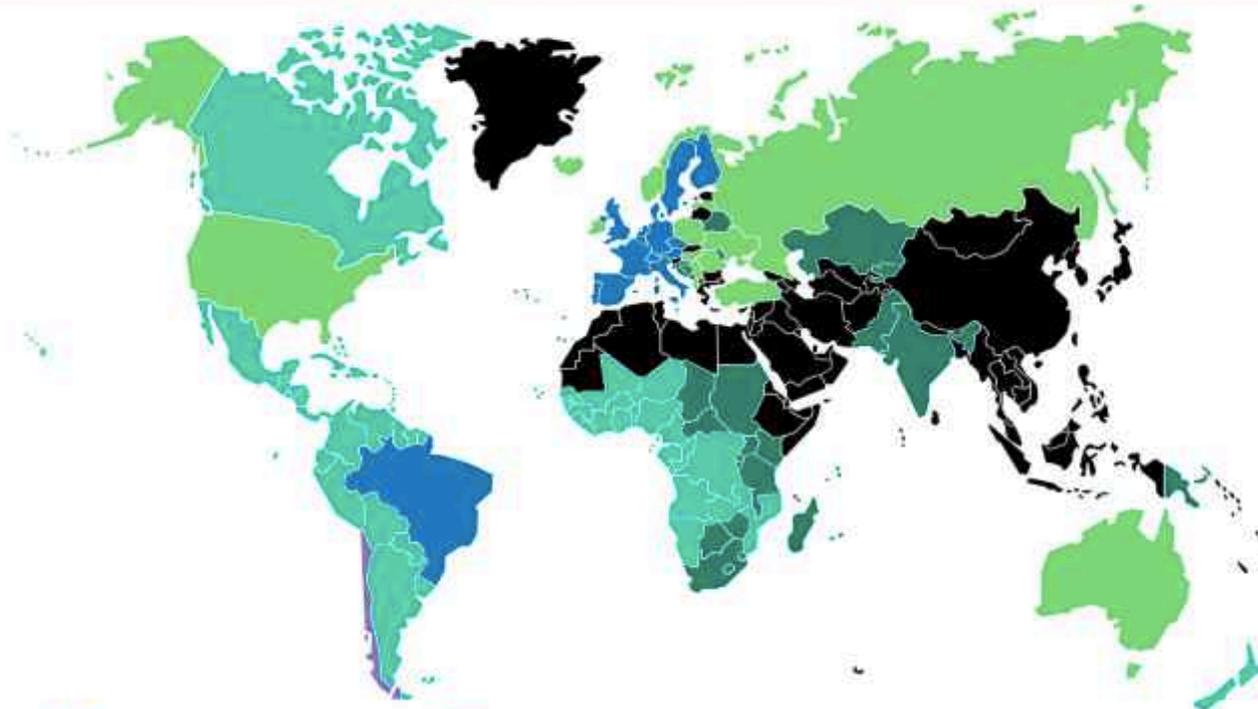


## ESO Science Outreach Network

The **ESO education and Public Outreach Department** has established a network of contacts in the **ESO Member states** and other countries. The goal of this ESO Science Outreach Network (ESON) is to act locally as ESO's media and outreach representative, in order to promote ESO's mission and achievements, and demonstrate the many inspirational aspects of astronomy. The ESON contacts can also serve as interface between the local scientists and the media. The communication between the member states (at the official and scientific levels) and ESO, takes place through **ESO's governing bodies**, and not through ESON, which deals only with outreach matters.

The ESON members are science communicators who know the national media and stake-holders, and regularly interact with them. They have a strong interest in promoting ESO, and provide regular inputs and ideas for how to best reach the target groups in their area. The ESON nodes are also in charge of translating the ESO material in their national language.

Below is the list of ESON members. If your country is not represented, and if you or your organization would be interested in acting as ESO's local outreach contact, contact us at [information@eso.org](mailto:information@eso.org).



- Blue square: ESO member states
- Purple square: ESO host
- Light Green square: Additional ESON members
- Medium Green square: Official languages fully supported
- Dark Green square: Official languages partly supported
- Black square: Official languages not supported

## ESON Countries

Member States:



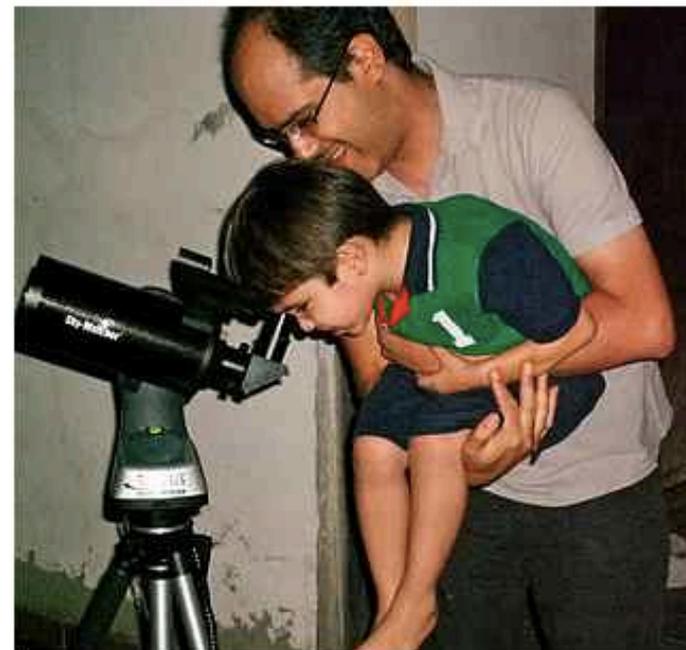
# ESO Science Outreach Network: Brasil



## Dr Gustavo Rojas

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Gustavo began his astronomy activities while he was a physics undergraduate at the University of São Paulo (USP). He then undertook postgraduate studies at USP, investigating young, low-mass stars, their chemical abundances and circumstellar environments. Since 2008 he has been a full-time astronomer at the Federal University of São Carlos (UFSCar), located 240 km northwest of São Paulo. He is in charge of a small observatory and works mainly on educational and outreach activities. Among the projects he is currently working on are the videocast, *O Céu da Semana* (The Weekly Sky) and the radio show *Paideia*. Both are produced in collaboration with the Open Laboratory for Interactivity (LAbI) at UFSCar. He is also an editor of the Latin American Journal of Astronomy Education (RELEA) and one of the Brazilian representatives in Galileo Teacher Training Program. His main interests in addition to astronomy are travelling, reading, photography and music. Read Gustavo's [blog](#).  
Gustavo on [Twitter](#) and [YouTube](#).



# Sugestão de Education & Public Outreach (EPO) Office para a USP

- Journalists: OK, existe em boa parte dos institutos
- Já existe boa parte de pessoas trabalhando em eventos, educação e web nos institutos da USP
- Precisamos urgentemente de uma equipe na USP para apoio em:
  - animações e ilustrações
  - “editor e proof reader”: revisa e edita os textos
  - “press officer”: contatos com a mídia (e apoio para coletivas de imprensa?)