

## IceCube M&amp;O Staffing Matrix sort by WBS v16 2014.0301.xls

WBS L2	WBS L3	Institution	Labor Cat.	Names	Tasks	NSF M&O Core	NSF Base Grants	U.S. Institutional In-Kind	Europe & Asia Pacific In-Kind	Grand Total	
2.1 Program Management	2.1.1 Administration	LBNL	KE	KLEIN,SPENCER	Supervise LBNL effort	0.05				0.05	
2.1 Program Management	2.1.1 Administration	LBNL	KE	KLEIN,SPENCER	Pubcom member			0.10		0.10	
2.1 Program Management	2.1.1 Administration	UWRF	KE	MADSEN, JIM	Speakers Comm Chair			0.25		0.25	
2.1 Program Management	2.1.1 Administration	PSU	KE	DEYOUNG, TYCE	Deputy Spokesperson			0.20		0.20	
2.1 Program Management	2.1.1 Administration	UCB	SC	FILIMONOV, KIRILL	Pubcom member		0.10			0.10	
2.1 Program Management	2.1.1 Administration	UCB	SC	WOSCHNAGG, KURT	Speakers Comm member		0.10			0.10	
2.1 Program Management	2.1.1 Administration	UCB	SC	WOSCHNAGG, KURT	Pubcom member		0.10			0.10	
2.1 Program Management	2.1.1 Administration	UD	KE	GAISSER, TOM	ExecCom member			0.20		0.20	
2.1 Program Management	2.1.1 Administration	UD	KE	STANEV, TODOR	Pubcom member			0.10		0.10	
2.1 Program Management	2.1.1 Administration	UMD	KE	SULLIVAN, GREG	ExecCom member			0.20		0.20	
2.1 Program Management	2.1.1 Administration	UMD	KE	SULLIVAN, GREG	M&O/Upgrade planning			0.30		0.30	
2.1 Program Management	2.1.1 Administration	UMD	SC	BLAUFUSS, ERIK	Analysis Coordinator			0.40		0.40	
2.1 Program Management	2.1.1 Administration	UMD	SC	OLIVAS, ALEX	IceCube Weekly call coordination			0.20		0.20	
2.1 Program Management	2.1.1 Administration	UMD	PO	WISSING, HENRIKE	Pubcom member		0.10			0.10	
2.1 Program Management	2.1.1 Administration	SBU	KE	KIRYLUK,JOANNA	Simulation Prod. Comm member			0.05		0.05	
2.1 Program Management	2.1.1 Administration	UW	KE	HALZEN, FRANCIS	Principle Investigator	0.35				0.35	
2.1 Program Management	2.1.1 Administration	UW	KE	HALZEN, FRANCIS	Principle Investigator			0.15		0.15	
2.1 Program Management	2.1.1 Administration	UW	KE	KARLE, ALBRECHT	Associate Director for Science	0.25				0.25	
2.1 Program Management	2.1.1 Administration	UW	KE	KARLE, ALBRECHT	Coordination Committee chair	0.10				0.10	
2.1 Program Management	2.1.1 Administration	UW	KE	KARLE, ALBRECHT	ExecCom member			0.20		0.20	
2.1 Program Management	2.1.1 Administration	UW	KE	VANDENBROUCKE, JUSTIN	Pubcom member			0.10		0.10	
2.1 Program Management	2.1.1 Administration	UW	KE	UW Manager	Director of Operations (TBD)	0.38				0.38	
2.1 Program Management	2.1.1 Administration	UW	MA	MERINO, GONZALO	Computing Infrastructure Manager	1.00				1.00	
2.1 Program Management	2.1.1 Administration	UW	MA	PELES, ADI	Resource Coordinator	0.50				0.50	
2.1 Program Management	2.1.1 Administration	UW	AD	VAKHNINA, CATHERINE	Deputy Resource Coordinator	0.50				0.50	
2.1 Program Management	2.1.1 Administration	<b>US Total</b>					<b>3.13</b>	<b>0.40</b>	<b>2.45</b>		<b>5.98</b>
2.1 Program Management	2.1.1 Administration	ALBERTA	KE	GRANT, DARREN	Pubcom adjoint member				0.10	0.10	
2.1 Program Management	2.1.1 Administration	ALBERTA	AD	ALBERTA AD	Host the 2014 Spring Collaboration Meeting				0.20	0.20	
2.1 Program Management	2.1.1 Administration	DESY	KE	ACKERMANN, MARKUS	ExecCom member				0.20	0.20	
2.1 Program Management	2.1.1 Administration	DPNC	KE	MONTARULI, TERESA	ICB Member				0.10	0.10	
2.1 Program Management	2.1.1 Administration	ERLANGEN	KE	KAPPES, ALEXANDER	Pubcom Chair				0.25	0.25	
2.1 Program Management	2.1.1 Administration	ERLANGEN	KE	KAPPES, ALEXANDER	ExecCom member				0.20	0.20	
2.1 Program Management	2.1.1 Administration	SU	KE	FINLEY, CHAD	ICB Member				0.05	0.05	
2.1 Program Management	2.1.1 Administration	SU	KE	HULTQVIST, KLAS	ICB Member				0.05	0.05	
2.1 Program Management	2.1.1 Administration	SU	KE	FINLEY, CHAD SU	Coordination with LIGO				0.10	0.10	
2.1 Program Management	2.1.1 Administration	SU	KE	WALCK, CHRISTIAN	Publications Bookkeeping				0.10	0.10	
2.1 Program Management	2.1.1 Administration	UC	KE	ADAMS, JENNI	ICB Member				0.05	0.05	
2.1 Program Management	2.1.1 Administration	ULB	KE	HANSON, Kael	ExecCom member				0.20	0.20	
2.1 Program Management	2.1.1 Administration	UU	KE	BOTNER, OLGA	Spokesperson				0.30	0.30	
2.1 Program Management	2.1.1 Administration	UU	KE	BOTNER, OLGA	ExecCom member				0.20	0.20	
2.1 Program Management	2.1.1 Administration	UU	KE	DE LOS HEROS, CARLOS	Pubcom member				0.10	0.10	
2.1 Program Management	2.1.1 Administration	UU	KE	HALLGREN, ALLAN	Speakers Comm member				0.10	0.10	
2.1 Program Management	2.1.1 Administration	VUB	KE	DE CLERCQ, CATHERINE	Institutional Lead				0.20	0.20	
2.1 Program Management	2.1.1 Administration	WUPPERTAL	KE	HELBING, KLAUS	Speakers Comm member				0.10	0.10	
2.1 Program Management	2.1.1 Administration	RWTH	KE	WIEBUSCH, CHRISTOPHER	ExecCom member				0.20	0.20	
2.1 Program Management	2.1.1 Administration	RWTH	KE	WIEBUSCH, CHRISTOPHER	Pubcom member				0.10	0.10	
2.1 Program Management	2.1.1 Administration	MAINZ	KE	KOPKE, LUTZ	Supernova group Co-Chair				0.25	0.25	
2.1 Program Management	2.1.1 Administration	BOCHUM	KE	TJUS, JULIA	Pubcom member				0.10	0.10	
2.1 Program Management	2.1.1 Administration	<b>Non-US Total</b>								<b>3.25</b>	<b>3.25</b>
2.1 Program Management	<b>2.1.1 Administration</b>						<b>3.13</b>	<b>0.40</b>	<b>2.45</b>	<b>3.25</b>	<b>9.23</b>
2.1 Program Management	2.1.2 Engineering And R&D Support	PSU	KE	COWEN, DOUG	PINGU Co-Lead			0.35		0.35	
2.1 Program Management	2.1.2 Engineering And R&D Support	OSU	KE	BEATTY, JAMES	PINGU Electronics and Calibration Development			0.10		0.10	
2.1 Program Management	2.1.2 Engineering And R&D Support	OSU	PO	ANDERSON, TYLER	PINGU Electronics and Calibration Development			0.25		0.25	
2.1 Program Management	2.1.2 Engineering And R&D Support	UMD	KE	HOFFMAN, KARA	Detector R&D			0.20		0.20	

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2.1 Program Management	2.1.2 Engineering And R&D Support	UW	SC	DUVERNOIS, MICHAEL	Specialized simulations, designing new filters, unusual data selections, extracting specialized information	0.25				0.25
2.1 Program Management	2.1.2 Engineering And R&D Support	UW	SC	DUVERNOIS, MICHAEL	Ongoing EMI studies & mitigation, South Pole & Northern test site instrumentation, Summer South Pole field work	0.25				0.25
2.1 Program Management	2.1.2 Engineering And R&D Support	UW	EN	LAUNDRIE, ANDREW	Engineering Support: IceCube Lab Summer operations, cabling, & instrumentation testing	0.80				0.80
2.1 Program Management	2.1.2 Engineering And R&D Support	UW	EN	SANDSTROM, PERRY	Ongoing EMI studies & mitigation, South Pole & Northern test site instrumentation, In-field work	0.15				0.15
2.1 Program Management	2.1.2 Engineering And R&D Support	UW	EN	SANDSTROM, PERRY	Engineering Support: IceCube Lab Summer operations, fieldwork management, design of the pDOM, GPS maintenance	0.75				0.75
2.1 Program Management	2.1.2 Engineering And R&D Support	UW	MA	HAUGEN, JAMES	Engineering Support: logistics, northern hemisphere testing, & vendor management	0.55				0.55
2.1 Program Management	2.1.2 Engineering And R&D Support	<b>US Total</b>				<b>2.75</b>	<b>0.00</b>	<b>0.90</b>		<b>3.65</b>
2.1 Program Management	2.1.2 Engineering And R&D Support	DESY	KE	NAHNHAUER, ROLF	Acoustic R&D Support PINGU R&D				0.10	0.10
2.1 Program Management	2.1.2 Engineering And R&D Support	DESY	PO	KARG, TIMO	Acoustic R&D Support PINGU R&D				0.10	0.10
2.1 Program Management	2.1.2 Engineering And R&D Support	DESY	GR	BRETZ, HANS-PETER	PINGU calibration studies				0.10	0.10
2.1 Program Management	2.1.2 Engineering And R&D Support	ALBERTA	KE	GRANT, DARREN	PINGU Co-Lead				0.10	0.10
2.1 Program Management	2.1.2 Engineering And R&D Support	BONN	PO	BOSSER, SEBASTIAN	PINGU R&D and software coordinator				0.20	0.20
2.1 Program Management	2.1.2 Engineering And R&D Support	RWTH	PO	AUFFENBERG, JAN	Surface Veto, IceCube extensions				0.30	0.30
2.1 Program Management	2.1.2 Engineering And R&D Support	RWTH	GR	HEINEN, DIRK	Acoustic R&D Support				0.10	0.10
2.1 Program Management	2.1.2 Engineering And R&D Support	SKKU	PO	BOSE, DEBANJAN	Reconstruction tools for PINGU				0.15	0.15
2.1 Program Management	2.1.2 Engineering And R&D Support	ULB	KE	HANSON, KAELE	EMI Measurements				0.10	0.10
2.1 Program Management	2.1.2 Engineering And R&D Support	ULB	PO	O'MURCHADHA, AONGUS	EMI Measurements				0.10	0.10
2.1 Program Management	2.1.2 Engineering And R&D Support	ULB	GR	MEURES, THOMAS	EMI Measurements				0.25	0.25
2.1 Program Management	2.1.2 Engineering And R&D Support	GENT	SC	UGENT SC	Acoustic R&D Support				0.05	0.05
2.1 Program Management	2.1.2 Engineering And R&D Support	GENT	GR	UGENT GR	Acoustic R&D Support				0.05	0.05
2.1 Program Management	2.1.2 Engineering And R&D Support	<b>Non-US Total</b>							<b>1.70</b>	<b>1.70</b>
2.1 Program Management	<b>2.1.2 Engineering And R&amp;D Support</b>					<b>2.75</b>	<b>0.00</b>	<b>0.90</b>	<b>1.70</b>	<b>5.35</b>

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2.1 Program Management	2.1.3 Usap Support	UW	MA	HAUGEN, JAMES	USAP Support: yearly sip, coordination with contractor (ASC)	0.25				0.25
2.1 Program Management	2.1.3 Usap Support	<b>US Total</b>				<b>0.25</b>				<b>0.25</b>
2.1 Program Management	<b>2.1.3 Usap Support</b>					<b>0.25</b>				<b>0.25</b>
2.1 Program Management	2.1.4 Education & Outreach	PSU	KE	COWEN, DOUG	Education & Outreach			0.05		0.05
2.1 Program Management	2.1.4 Education & Outreach	PSU	KE	DEYOUNG, TYCE	Education & Outreach			0.05		0.05
2.1 Program Management	2.1.4 Education & Outreach	UCB	KE	PRICE, BUFORD	Education & Outreach			0.10		0.10
2.1 Program Management	2.1.4 Education & Outreach	UMD	KE	UMD KE	Education & Outreach			0.10		0.10
2.1 Program Management	2.1.4 Education & Outreach	UW	AD	Bacque, Laurel	Education & Outreach Coordination	0.50				0.50
2.1 Program Management	2.1.4 Education & Outreach	UW	AD	BRAVO GALLART, SILVIA	Education & Outreach	0.25				0.25
2.1 Program Management	2.1.4 Education & Outreach	UW	AD	Madsen, Megan	Education & Outreach Coordination	0.75				0.75
2.1 Program Management	2.1.4 Education & Outreach	UWRF	KE	MADSEN, JIM	Teachers program and UWRF Upward	0.10				0.10
2.1 Program Management	2.1.4 Education & Outreach	UWRF	AD	UWRF AD	Teachers Program	0.10				0.10
2.1 Program Management	2.1.4 Education & Outreach	<b>US Total</b>				<b>1.70</b>	<b>0.00</b>	<b>0.30</b>		<b>2.00</b>
2.1 Program Management	<b>2.1.4 Education &amp; Outreach</b>					<b>1.70</b>	<b>0.00</b>	<b>0.30</b>		<b>2.00</b>
2.1 Program Management	2.1.4 Education & Outreach	UU	KE	HALLGREN, ALLAN	Education & Outreach				0.05	0.05
2.1 Program Management	2.1.4 Education & Outreach	UU	KE	BOTNER, OLGA	Education & Outreach				0.05	0.05
2.1 Program Management	2.1.4 Education & Outreach	SU	KE	HULTH, PER OLOF	Organisation of outreach events in Stockholm				0.05	0.05
2.1 Program Management	2.1.4 Education & Outreach	SKKU	KE	ROTT, CARSTEN	Education & Outreach				0.05	0.05
2.1 Program Management	2.1.4 Education & Outreach	<b>Non-US Total</b>							<b>0.20</b>	<b>0.20</b>
2.1 Program Management	<b>2.1.4 Education &amp; Outreach</b>					<b>1.70</b>	<b>0.00</b>	<b>0.30</b>	<b>0.20</b>	<b>2.20</b>
<b>2.1 Program Management</b>	<b>WBS L2 Total</b>					<b>7.83</b>	<b>0.40</b>	<b>3.65</b>	<b>5.15</b>	<b>17.03</b>
2.2 Detector Operations & Maintenance	2.2 Detector Operations & Maintenance	LBNL	KE	NYGREN,DAVID R	Track Engine Trigger			0.10		0.10
2.2 Detector Operations & Maintenance	2.2 Detector Operations & Maintenance	UW	SC	KELLEY, JOHN	Detector Maintenance and Operations Manager	0.75				0.75
2.2 Detector Operations & Maintenance	2.2 Detector Operations & Maintenance	UMD	SC	OLIVAS, ALEX	Support Detector M&O			0.40		0.40
2.2 Detector Operations & Maintenance	2.2 Detector Operations & Maintenance	<b>US Total</b>				<b>0.75</b>	<b>0.00</b>	<b>0.50</b>		<b>1.25</b>
2.2 Detector Operations & Maintenance	2.2 Detector Operations & Maintenance	UMH	GR	KOHNEN, GEORGES	Database Coordinator				0.10	0.10
2.2 Detector Operations & Maintenance	2.2 Detector Operations & Maintenance	<b>Non-US Total</b>							<b>0.10</b>	<b>0.10</b>
2.2 Detector Operations & Maintenance	<b>2.2 Detector Operations &amp; Maintenance</b>					<b>0.75</b>	<b>0.00</b>	<b>0.50</b>	<b>0.10</b>	<b>1.35</b>
2.2 Detector Operations & Maintenance	2.2.1 Run Coordination	UW	IT	Auer, Ralf	Winterovers coordinator, hiring and training of winterovers	0.25				0.25
2.2 Detector Operations & Maintenance	2.2.1 Run Coordination	UW	PO	KAUER, MATTHEW	Run Coordinator	0.50				0.50
2.2 Detector Operations & Maintenance	2.2.1 Run Coordination	UW	WO	UW Winter Overs	Operate Detector (Winter-Overs)	3.00				3.00
2.2 Detector Operations & Maintenance	2.2.1 Run Coordination	<b>US Total</b>				<b>3.75</b>	<b>0.00</b>	<b>0.00</b>		<b>3.75</b>
2.2 Detector Operations & Maintenance	2.2.1 Run Coordination	UC	GR	UC GR	Flasher Runs				0.10	0.10
2.2 Detector Operations & Maintenance	2.2.1 Run Coordination	<b>Non-US Total</b>							<b>0.10</b>	<b>0.10</b>
2.2 Detector Operations & Maintenance	<b>2.2.1 Run Coordination</b>					<b>3.75</b>	<b>0.00</b>	<b>0.00</b>	<b>0.10</b>	<b>3.85</b>
2.2 Detector Operations & Maintenance	2.2.2 Data Acquisition	LBNL	EN	STEZELBERGER,THORSTEN	Maintain DAQ Hardware (Hubs, DOR, Clocks, GPS...)	0.15				0.15
2.2 Detector Operations & Maintenance	2.2.2 Data Acquisition	UD	KE	SECKEL, DAVID	DAQ Monitoring			0.05		0.05
2.2 Detector Operations & Maintenance	2.2.2 Data Acquisition	UW	SC	KELLEY, JOHN	DOM Cal Maintenance, DOM issues	0.15				0.15
2.2 Detector Operations & Maintenance	2.2.2 Data Acquisition	UW	CS	Frere, Michael	Maintain DAQ Software Systems (IceCube Live) and track changes with time in the detector	1.00				1.00
2.2 Detector Operations & Maintenance	2.2.2 Data Acquisition	UW	CS	GLOWACKI, DAVID	Maintain DAQ Software Systems (incl. triggers, up to Event Builder) and track changes with time in the detector	1.00				1.00

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2.2 Detector Operations & Maintenance	2.2.2 Data Acquisition	UW	CS	UW CS	Maintain DAQ Software Systems experiment control and monitoring, DOM and DOMhub (software) and track changes with time in the detector	0.75				0.75
2.2 Detector Operations & Maintenance	2.2.2 Data Acquisition	UW	CS	UW CS	Maintain low-level DAQ software (DOR device driver, DOM software)	0.15				0.15
2.2 Detector Operations & Maintenance	2.2.2 Data Acquisition	UW	GR	WEAVER, CHRISTOPHER	DOM CAL Maintenance		0.20			0.20
2.2 Detector Operations & Maintenance	2.2.2 Data Acquisition	<b>US Total</b>				<b>3.20</b>	<b>0.20</b>	<b>0.05</b>		<b>3.45</b>
2.2 Detector Operations & Maintenance	2.2.2 Data Acquisition	ULB	KE	HANSON, KAELE	Data Acquisition				0.20	0.20
2.2 Detector Operations & Maintenance	2.2.2 Data Acquisition	ULB	GR	HEEREMAN, DAVID	Develop Hit Spooling for Supernova & others				0.50	0.50
2.2 Detector Operations & Maintenance	2.2.2 Data Acquisition	ULB	GR	DeWasseige, Gwen	Detector Noise Studies				0.10	0.10
2.2 Detector Operations & Maintenance	2.2.2 Data Acquisition	ULB	GR	PINAT, ELISA	Data Acquisition				0.20	0.20
2.2 Detector Operations & Maintenance	2.2.2 Data Acquisition	<b>Non-US Total</b>							<b>1.00</b>	<b>1.00</b>
2.2 Detector Operations & Maintenance	2.2.2 Data Acquisition	<b>2.2.2 Data Acquisition</b>				<b>3.20</b>	<b>0.20</b>	<b>0.05</b>	<b>1.00</b>	<b>4.45</b>
2.2 Detector Operations & Maintenance	2.2.3 Online Filter (Pnf)	UMD	SC	BLAUFUSS, ERIK	Maintain PnF S/W and Online Filters	0.20				0.20
2.2 Detector Operations & Maintenance	2.2.3 Online Filter (Pnf)	UMD	CS	Schmidt, Torsten	Maintain PnF Software and Online Filters	0.30				0.30
2.2 Detector Operations & Maintenance	2.2.3 Online Filter (Pnf)	UMD	GR	RICHMEN, MIKE	Online Filter Testing		0.13			0.13
2.2 Detector Operations & Maintenance	2.2.3 Online Filter (Pnf)	<b>US Total</b>				<b>0.50</b>	<b>0.13</b>	<b>0.00</b>		<b>0.63</b>
2.2 Detector Operations & Maintenance	2.2.3 Online Filter (Pnf)	<b>2.2.3 Online Filter (Pnf)</b>				<b>0.50</b>	<b>0.13</b>	<b>0.00</b>		<b>0.63</b>
2.2 Detector Operations & Maintenance	2.2.4 Sps Operations	UW	IT	Auer, Ralf	Maintain South Pole Computing H/W Infrastructure and operating systems	0.50				0.50
2.2 Detector Operations & Maintenance	2.2.4 Sps Operations	UW	IT	WISNIEWSKI, PAUL	Networking and Security Maintenance	0.25				0.25
2.2 Detector Operations & Maintenance	2.2.4 Sps Operations	<b>US Total</b>				<b>0.75</b>	<b>0.00</b>	<b>0.00</b>		<b>0.75</b>
2.2 Detector Operations & Maintenance	2.2.4 Sps Operations	<b>2.2.4 Sps Operations</b>				<b>0.75</b>	<b>0.00</b>	<b>0.00</b>		<b>0.75</b>
2.2 Detector Operations & Maintenance	2.2.5 Spts Operations	UW	IT	Auer, Ralf	Maintain South Pole Computing H/W Infrastructure and operating systems	0.25				0.25
2.2 Detector Operations & Maintenance	2.2.5 Spts Operations	<b>US Total</b>				<b>0.25</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.25</b>
2.2 Detector Operations & Maintenance	2.2.5 Spts Operations	<b>2.2.5 Spts Operations</b>				<b>0.25</b>	<b>0.00</b>	<b>0.00</b>		<b>0.25</b>
2.2 Detector Operations & Maintenance	2.2.6 Experiment Control	UW	CS	UW CS	IceCube Live Maintenance and Upgrades	0.65				0.65
2.2 Detector Operations & Maintenance	2.2.6 Experiment Control	<b>US Total</b>				<b>0.65</b>	<b>0.00</b>	<b>0.00</b>		<b>0.65</b>
2.2 Detector Operations & Maintenance	2.2.6 Experiment Control	<b>2.2.6 Experiment Control</b>				<b>0.65</b>	<b>0.00</b>	<b>0.00</b>		<b>0.65</b>
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	CAU	KE	JAPARIDZE, GEORGE	Monitoring shifts			0.02		0.02
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	GTECH	GR	CASEY, JAMES	Monitoring shifts		0.03			0.03
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	KU	KE	BESSON, DAVE	Monitoring shifts			0.02		0.02
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	SBU	KE	KIRYLUK, JOANNA	BadDomList			0.05		0.05
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	SBU	PO	LESIAK-BZDAK, MARIOLA	Detector Monitoring		0.05			0.05
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	LBNL	PO	CHANG, HYON HA	Monitoring shifts		0.09			0.09
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	PSU	PO	ARLEN, TIM	Monitoring shifts		0.03			0.03
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	PSU	GR	DUNKMAN, MATT	Monitoring shifts		0.03			0.03
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	SUBR	KE	TER-ANTONYAN, SAMVEL	Detector Monitoring			0.02		0.02
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	UA	PO	PALCZEWSKI, TOMASZ	Monitoring shifts		0.05			0.05
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	UA	PO	PALCZEWSKI, TOMASZ	Moni 2.0 development		0.05			0.05
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	UAA	KE	RAWLINS, KATHERINE	Monitoring shifts			0.02		0.02
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	UCB	SC	FILIMONOV, KIRILL	Coordinate Monitoring		0.25			0.25
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	UCB	SC	FILIMONOV, KIRILL	Coordinate Monitoring	0.25				0.25
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	UCB	SC	UCB SC	Monitoring shifts		0.02			0.02
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	UCI	PO	SILVERSTRI, ANDREA	Monitoring shifts			0.01		0.01
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	UCI	GR	HANSON, JORDAN	Monitoring shifts			0.01		0.01
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	UMD	GR	UMD GR	Monitoring shifts		0.06			0.06
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	UW	PO	UW PO	Monitoring shifts		0.12			0.12
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	UW	GR	UW GR	Monitoring shifts		0.12			0.12
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	<b>US Total</b>				<b>0.25</b>	<b>0.90</b>	<b>0.14</b>		<b>1.29</b>

IceCube M&O Staffing Matrix sort by WBS v16 2014.0301.xls

WBS L2	WBS L3	Institution	Labor Cat.	Names	Tasks	NSF M&O Core	NSF Base Grants	U.S. Institutional In-Kind	Europe & Asia Pacific In-Kind	Grand Total	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	CHIBA	GR	CHIBA GR	Detector Monitoring				0.03	0.03	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	DESY	SC	DESY SC	Detector Monitoring				0.05	0.05	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	DESY	GR	DESY GR	Detector Monitoring				0.12	0.12	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	DTMND	GR	DTMD GR	Detector Monitoring				0.03	0.03	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	TUM	GR	MPI GR	Detector Monitoring				0.05	0.05	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	RWTH	GR	BLUMENTHAL, JAN	Monitoring contact				0.05	0.05	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	RWTH	GR	PAUL, LARRISA	RASTA Data Monitoring				0.10	0.10	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	RWTH	GR	RWTH GR	Monitoring (4 weeks)				0.12	0.12	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	SKKU	GR	JEONG, DONGVOUNG	Detector Monitoring				0.03	0.03	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	SU	KE	HULTH, PER OLOF	IceCube camera system events in Stockholm				0.10	0.10	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	SU	GR	SU GR	Detector Monitoring				0.06	0.06	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	UC	KE	ADAMS, JENNI	Detector Monitoring				0.05	0.05	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	ULB	GR	ULB GR	Detector Monitoring				0.06	0.06	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	UOX	KE	SARKAR, SUBIR	Detector Monitoring				0.02	0.02	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	UU	GR	STRÖM, RICKARD	Monitoring Shifts				0.03	0.03	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	UU	GR	UNGER, LISA	Tools development				0.10	0.10	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	UU	GR	TAAVOLA, HENRIC	Monitoring Shifts				0.03	0.03	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	VUB	PO	VUB PO	Monitoring shifts				0.06	0.06	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	VUB	GR	VUB GR	Monitoring shifts				0.06	0.06	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	WUPPERTAL	GR	WUPPERTAL GR	South Pole EMI Monitoring				0.15	0.15	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	WUPPERTAL	GR	WUPPERTAL GR	SPATS				0.35	0.35	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	MAINZ	GR	UM GR	Detector Monitoring				0.05	0.05	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	GENT	GR	UGENT GR	Detector Monitoring				0.03	0.03	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	DPNC	GR	ASEN, CHRISTOV	Detector Monitoring				0.10	0.10	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	DPNC	GR	RAAMEZ MOHAMED	Detector Monitoring				0.10	0.10	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	BONN	GR	UBONN GR	Detector Monitoring				0.05	0.05	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	BONN	PO	BOSSER, SEBASTIAN	Monitoring development				0.20	0.20	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	BOCHUM	GR	SABA, ISAAC	Detector Monitoring				0.03	0.03	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	NBI	GR	LARSON, MICHAEL	Monitoring shifts				0.03	0.03	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	NBI	GR	MEDICI, MORTEN	Monitoring shifts				0.03	0.03	
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring	<b>Non-US Total</b>								<b>2.27</b>	<b>2.27</b>
2.2 Detector Operations & Maintenance	2.2.7 Detector Monitoring					<b>0.25</b>	<b>0.90</b>	<b>0.14</b>	<b>2.27</b>	<b>3.56</b>	
2.2 Detector Operations & Maintenance	2.2.8 Detector Calibration	GTECH	GR	CASEY, JAMES	Bubble studies with flashers		0.20			0.20	
2.2 Detector Operations & Maintenance	2.2.8 Detector Calibration	UA	KE	WILLIAMS, DAWN	managing flasher runs coordinating low level calibration effort	0.20				0.20	
2.2 Detector Operations & Maintenance	2.2.8 Detector Calibration	UA	PO	PALCZEWSKI, TOMASZ	SPE recalibration		0.05			0.05	
2.2 Detector Operations & Maintenance	2.2.8 Detector Calibration	UA	GR	XU, DONGLIAN	Low-energy cascade calibration with flashers		0.10			0.10	
2.2 Detector Operations & Maintenance	2.2.8 Detector Calibration	UA	GR	PEPPER, JAMES	IceCube Live C&V		0.05			0.05	
2.2 Detector Operations & Maintenance	2.2.8 Detector Calibration	UW	SC	WENDT, CHRISTOPHER	Absolute DOM sensitivity	0.40				0.40	
2.2 Detector Operations & Maintenance	2.2.8 Detector Calibration	UW	SC	WENDT, CHRISTOPHER	Flasher output, flasher calibration	0.20				0.20	
2.2 Detector Operations & Maintenance	2.2.8 Detector Calibration	UW	SC	WENDT, CHRISTOPHER	DOM charge response, linearity, DOM calibration support	0.20				0.20	
2.2 Detector Operations & Maintenance	2.2.8 Detector Calibration	UW	GR	FEINTZIG, JACOB	Ice Properties		0.10			0.10	
2.2 Detector Operations & Maintenance	2.2.8 Detector Calibration	UW	GR	JERO, KYLE	DOM Linearity, sensitivity		0.15			0.15	
2.2 Detector Operations & Maintenance	2.2.8 Detector Calibration	<b>US Total</b>					<b>1.00</b>	<b>0.65</b>	<b>0.00</b>	<b>1.65</b>	
2.2 Detector Operations & Maintenance	2.2.8 Detector Calibration	DESY	GR	STOESSL, ACHIM	Flasher Analysis				0.20	0.20	
2.2 Detector Operations & Maintenance	2.2.8 Detector Calibration	<b>Non-US Total</b>								<b>0.20</b>	<b>0.20</b>
2.2 Detector Operations & Maintenance	2.2.8 Detector Calibration					<b>1.00</b>	<b>0.65</b>	<b>0.00</b>	<b>0.20</b>	<b>1.85</b>	
2.2 Detector Operations & Maintenance	2.2.9 Icetop Operations	UD	SC	TILAV, SERAP	Coordinate IceTop Operations	1.00				1.00	
2.2 Detector Operations & Maintenance	2.2.9 Icetop Operations	<b>US Total</b>				<b>1.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>1.00</b>	
2.2 Detector Operations & Maintenance	2.2.9 Icetop Operations					<b>1.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>1.00</b>	
2.2 Detector Operations & Maintenance	2.2.10 Supernova Operations	UW	GR	RIEDEL, BENEDIKT	Supernova DAQ		0.15			0.15	
2.2 Detector Operations & Maintenance	2.2.10 Supernova Operations	<b>US Total</b>				<b>0.00</b>	<b>0.15</b>	<b>0.00</b>	<b>0.00</b>	<b>0.15</b>	
2.2 Detector Operations & Maintenance	2.2.10 Supernova Operations	MAINZ	GR	KROLL, GÖSTA	SuperNova Operations				0.10	0.10	
2.2 Detector Operations & Maintenance	2.2.10 Supernova Operations	MAINZ	GR	EBERHARD, BENJAMIN	SuperNova Operations				0.50	0.50	
2.2 Detector Operations & Maintenance	2.2.10 Supernova Operations	MAINZ	GR	BAUM, VOLKER	SuperNova Operations				0.50	0.50	
2.2 Detector Operations & Maintenance	2.2.10 Supernova Operations	<b>Non-US Total</b>								<b>1.10</b>	<b>1.10</b>
2.2 Detector Operations & Maintenance	2.2.10 Supernova Operations					<b>0.00</b>	<b>0.15</b>	<b>0.00</b>	<b>1.10</b>	<b>1.25</b>	
<b>2.2 Detector Operations &amp; Maintenance</b>	<b>WBS L2 Total</b>					<b>12.10</b>	<b>2.03</b>	<b>0.69</b>	<b>4.77</b>	<b>19.58</b>	
2.3 Computing And Data Management	2.3.1 Core Software	UMD	GR	HELLAUER, ROBERT	Core Software		0.13			0.13	
2.3 Computing And Data Management	2.3.1 Core Software	UMD	CS	Schmidt, Torsten	Maintain Core Analysis Framework (IceTray)	0.50				0.50	
2.3 Computing And Data Management	2.3.1 Core Software	UMD	CS	Straszheim, Troy	Maintain Core Analysis Framework (IceTray)	1.00				1.00	
2.3 Computing And Data Management	2.3.1 Core Software	UMD	CS	UMD CS	Maintain Core Software Repository	0.50				0.50	
2.3 Computing And Data Management	2.3.1 Core Software	UMD	GR	MAUNU, RYAN	Detector R&D		0.25			0.25	



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WBS L2	WBS L3	Institution	Labor Cat.	Names	Tasks	NSF M&O Core	NSF Base Grants	U.S. Institutional In-Kind	Europe & Asia Pacific In-Kind	Grand Total
2.3 Computing And Data Management	2.3.1 Core Software	UW	DH	DIAZ-VELEZ, JUAN CARLOS	Simulation production & data processing software framework (IceProd), and simulation programs (detector response)	0.80				0.80
2.3 Computing And Data Management	2.3.1 Core Software	UW	CS	Braun, Jim	Development of IceCube event viewer software	0.75				0.75
2.3 Computing And Data Management	2.3.1 Core Software	UW	CS	Braun, Jim	Software support, code reviews	0.25				0.25
2.3 Computing And Data Management	2.3.1 Core Software	UW	DH	FADIRAN, OLADIPO	Maintain Data Processing Software	0.20				0.20
2.3 Computing And Data Management	2.3.1 Core Software	<b>US Total</b>				<b>4.00</b>	<b>0.38</b>	<b>0.00</b>		<b>4.38</b>
2.3 Computing And Data Management	2.3.1 Core Software	UU	SC	BOERSMA, DAVID	Maintain Reconstruction Framework				0.10	0.10
2.3 Computing And Data Management	2.3.1 Core Software	<b>Non-US Total</b>							<b>0.10</b>	<b>0.10</b>
<b>2.3.1 Core Software</b>						<b>4.00</b>	<b>0.38</b>	<b>0.00</b>	<b>0.10</b>	<b>4.48</b>
2.3 Computing And Data Management	2.3.2 Data Storage & Transfer	UW	DH	FADIRAN, OLADIPO	Transformation of Data for Long-Term Persistence and Archival. Maintain Data Warehouse Standards, Software (Ingest), Data Access (FTP), and Web Interface	0.20				0.20
2.3 Computing And Data Management	2.3.2 Data Storage & Transfer	UW	IT	RICHARDS, JOHN	Maintain and Operate Data Storage Infrastructure	1.00				1.00
2.3 Computing And Data Management	2.3.2 Data Storage & Transfer	UW	IT	BELLINGER, JIM	Maintain and Operate Data Storage Infrastructure	0.75				0.75
2.3 Computing And Data Management	2.3.2 Data Storage & Transfer	UW	CS	MEADE, PATRICK	Transfer Data from S. Pole to UW Data Warehouse and Archive at S. Pole. Maintain Data Transfer SW (SPADE). Maintain Data Warehouse Standards, Software (Ingest), Data Access (FTP), and Web Interface	0.50				0.50
2.3 Computing And Data Management	2.3.2 Data Storage & Transfer	<b>US Total</b>				<b>2.45</b>	<b>0.00</b>	<b>0.00</b>		<b>2.45</b>
2.3 Computing And Data Management	2.3.2 Data Storage & Transfer	DESY	GR	STOESSL, ACHIM	Data Storage & Transfer				0.10	0.10
2.3 Computing And Data Management	2.3.2 Data Storage & Transfer	<b>Non-US Total</b>							<b>0.10</b>	<b>0.10</b>
<b>2.3.2 Data Storage &amp; Transfer</b>						<b>2.45</b>	<b>0.00</b>	<b>0.00</b>	<b>0.10</b>	<b>2.55</b>
2.3 Computing And Data Management	2.3.3 Computing Resources	PSU	PO	JOAO PEDRO DE ANDRES	Coordination and Support for Grid and distributed computing	0.25				0.25
2.3 Computing And Data Management	2.3.3 Computing Resources	SUBR	KE	TER-ANTONYAN, SAMVEL	LONI Grid computing			0.30		0.30
2.3 Computing And Data Management	2.3.3 Computing Resources	UMD	IT	UMD IT	Coordination and Support for Grid and distributed computing	0.25				0.25
2.3 Computing And Data Management	2.3.3 Computing Resources	UW	IT	STOCK, BEN	Maintain Data Center Infrastructure	1.00				1.00
2.3 Computing And Data Management	2.3.3 Computing Resources	UW	IT	Barnet, Steve	Maintain Core Computing Systems, Coordination Grid & distributed computing	1.00				1.00
2.3 Computing And Data Management	2.3.3 Computing Resources	UW	IT	BELLINGER, JIM	Maintain Core High Performance Computing Systems	0.25				0.25
2.3 Computing And Data Management	2.3.3 Computing Resources	UW	IT	BRIK, VLADIMIR	Maintain Core High Performance Computing Systems	0.50				0.50
2.3 Computing And Data Management	2.3.3 Computing Resources	UW	IT	WISNIEWSKI, PAUL	Maintain Data Center Networking and Security	0.75				0.75
2.3 Computing And Data Management	2.3.3 Computing Resources	UW	IT	BRIK, VLADIMIR	Maintain Data Center Infrastructure	0.50				0.50
2.3 Computing And Data Management	2.3.3 Computing Resources	<b>US Total</b>				<b>4.50</b>	<b>0.00</b>	<b>0.30</b>		<b>4.80</b>
2.3 Computing And Data Management	2.3.3 Computing Resources	DESY	IT	DESY IT	European Data Center -Distributed Computing and Labor				2.00	2.00
2.3 Computing And Data Management	2.3.3 Computing Resources	DTMND	SC	PIELOTH, DAMIAN	Coordinate GRID computing in Germany				0.25	0.25
2.3 Computing And Data Management	2.3.3 Computing Resources	SU	SC	SU SC	Computing Resources				0.10	0.10
2.3 Computing And Data Management	2.3.3 Computing Resources	UU	SC	BOERSMA, DAVID	Computing Resources				0.25	0.25
2.3 Computing And Data Management	2.3.3 Computing Resources	UMH	GR	KOHNEN, GEORGES	IC database management				0.30	0.30
2.3 Computing And Data Management	2.3.3 Computing Resources	<b>Non-US Total</b>							<b>2.90</b>	<b>2.90</b>
<b>2.3.3 Computing Resources</b>						<b>4.50</b>	<b>0.00</b>	<b>0.30</b>	<b>2.90</b>	<b>7.70</b>
2.3 Computing And Data Management	2.3.4 Data Production Processing	UW	PO	SANTANDER, MARCOS	optimize the efficiency of Simulation Production	0.50				0.50
2.3 Computing And Data Management	2.3.4 Data Production Processing	GTECH	GR	DAUGHETTEE, JACOB	online / L2 / L3 processing for low energy group		0.20			0.20
2.3 Computing And Data Management	2.3.4 Data Production Processing	UMD	PO	FELDE, JOHN	Implement near real time GRB analysis		0.40			0.40
2.3 Computing And Data Management	2.3.4 Data Production Processing	UW	CS	MEADE, PATRICK	Unpacking, Decoding & Calibration of Raw Data (Level1); Run Common Reconstructions on UW IceCube Compute Cluster (Level2)	0.50				0.50
2.3 Computing And Data Management	2.3.4 Data Production Processing	<b>US Total</b>				<b>1.00</b>	<b>0.60</b>	<b>0.00</b>		<b>1.60</b>
2.3 Computing And Data Management	2.3.4 Data Production Processing	<b>Non-US Total</b>							<b>0.00</b>	<b>0.00</b>
<b>2.3.4 Data Production Processing</b>						<b>1.00</b>	<b>0.60</b>	<b>0.00</b>	<b>0.00</b>	<b>1.60</b>
2.3 Computing And Data Management	2.3.5 Simulation Production	LBLN	PO	CHANG, HYON HA	Simulation Production on PDSF		0.20			0.20

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WBS L2	WBS L3	Institution	Labor Cat.	Names	Tasks	NSF M&O Core	NSF Base Grants	U.S. Institutional In-Kind	Europe & Asia Pacific In-Kind	Grand Total	
2.3 Computing And Data Management	2.3.5 Simulation Production	PSU	PO	ARLEN, TIM	Simulation Production		0.08			0.08	
2.3 Computing And Data Management	2.3.5 Simulation Production	PSU	PO	JOAO PEDRO DE ANDRES	Simulation Production, IceSim vetting for LowEn		0.08			0.08	
2.3 Computing And Data Management	2.3.5 Simulation Production	OSU	PO	SUTHERLAND, MICHAEL	Simulation Production			0.10		0.10	
2.3 Computing And Data Management	2.3.5 Simulation Production	UD	PO	TAMBURRO, ALESSIO	IceTop Simulation Production		0.35			0.35	
2.3 Computing And Data Management	2.3.5 Simulation Production	UMD	GR	CHEUNG, ELIM	Simulation Production coordination			0.25		0.25	
2.3 Computing And Data Management	2.3.5 Simulation Production	UW	SC	DESIATI, PAOLO	Coordination of Simulation Production, identifying resources, streamlining programs for the cloud, GPU	0.40				0.40	
2.3 Computing And Data Management	2.3.5 Simulation Production	UW	SC	DESIATI, PAOLO	Simulation Production panel chair			0.20		0.20	
2.3 Computing And Data Management	2.3.5 Simulation Production	UW	PO	DAY, MELANIE	Low energy simulation production, event reconstruction		0.25			0.25	
2.3 Computing And Data Management	2.3.5 Simulation Production	UW	GR	MCNALLY, FRANK	IceTop Simulation ProductionProduction / Data Processing		0.30			0.30	
2.3 Computing And Data Management	2.3.5 Simulation Production	UW	DH	SCHULTZ, DAVID	Simulation Production	1.00				1.00	
2.3 Computing And Data Management	2.3.5 Simulation Production	<b>US Total</b>					<b>1.40</b>	<b>1.51</b>	<b>0.30</b>		<b>3.21</b>
2.3 Computing And Data Management	2.3.5 Simulation Production	DESY	GR	DESY GR	Simulation Production Cluster				0.15	0.15	
2.3 Computing And Data Management	2.3.5 Simulation Production	DESY	SC	GORA, DARIUSZ	Simulation Production Cluster				0.20	0.20	
2.3 Computing And Data Management	2.3.5 Simulation Production	DTMND	GR	ZIEMANN, JAN	Maintenance of the local IceCube MC Production				0.20	0.20	

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WBS L2	WBS L3	Institution	Labor Cat.	Names	Tasks	NSF M&O Core	NSF Base Grants	U.S. Institutional In-Kind	Europe & Asia Pacific In-Kind	Grand Total
2.3 Computing And Data Management	2.3.5 Simulation Production	RWTH	GR	REIMAN, RENE	GPU Mass production on AC-RZ cluster				0.20	0.20
2.3 Computing And Data Management	2.3.5 Simulation Production	RWTH	GR	PAUL, LARRISA	Simulation Production on cluster/GRID				0.10	0.10
2.3 Computing And Data Management	2.3.5 Simulation Production	RWTH	GR	VEHRING, MARKUS	Low energy Simulation Production				0.20	0.20
2.3 Computing And Data Management	2.3.5 Simulation Production	RWTH	GR	LEIF RADEL	Geant Simulations & Light yield				0.05	0.05
2.3 Computing And Data Management	2.3.5 Simulation Production	ULB	CS	AMARY, SAMIR	Computer Cluster - simulation				0.20	0.20
2.3 Computing And Data Management	2.3.5 Simulation Production	ALBERTA	KE	GRANT, DARREN	WestGrid computing				0.10	0.10
2.3 Computing And Data Management	2.3.5 Simulation Production	ALBERTA	GR	NOWICKI, SARAH	Clsim photon table production				0.35	0.35
2.3 Computing And Data Management	2.3.5 Simulation Production	WUPPERTAL	GR	WUPPERTAL GR	Simulation Production				0.20	0.20
2.3 Computing And Data Management	2.3.5 Simulation Production	MAINZ	GR	WIEBE, KLAUS	Simulation Production				0.10	0.10
2.3 Computing And Data Management	2.3.5 Simulation Production	CHIBA	KE	KEIICHI MASE	Generating background event simulation by Corsika				0.20	0.20
2.3 Computing And Data Management	2.3.5 Simulation Production	NBI	KE	KOSKINEN, JASON	Low-energy/PINGU Simulation				0.10	0.10
2.3 Computing And Data Management	2.3.5 Simulation Production	Toronto	KE	CLARK, KENNETH	SciNet computing				0.25	0.25
2.3 Computing And Data Management	2.3.5 Simulation Production	Toronto	KE	CLARK, KENNETH	GENIE maintenance				0.10	0.10
2.3 Computing And Data Management	2.3.5 Simulation Production	UMH	GR	KOHNNEN, GEORGES	Simulation Production				0.25	0.25
2.3 Computing And Data Management	2.3.5 Simulation Production	<b>Non-US Total</b>							<b>2.95</b>	<b>2.95</b>
2.3 Computing And Data Management	<b>2.3.5 Simulation Production</b>					<b>1.40</b>	<b>1.51</b>	<b>0.30</b>	<b>2.95</b>	<b>6.16</b>
<b>2.3 Computing And Data Management</b>	<b>WBS L2 Total</b>					<b>13.35</b>	<b>2.49</b>	<b>0.60</b>	<b>6.05</b>	<b>22.49</b>
2.4 Triggering And Filtering	2.4.1 TFT Coordination	GTECH	KE	TABOADA, IGNACIO	TFT Board Chair		0.25			0.25
2.4 Triggering And Filtering	2.4.1 TFT Coordination	UA	KE	WILLIAMS, DAWN	TFT Board member			0.10		0.10
2.4 Triggering And Filtering	2.4.1 TFT Coordination	UD	KE	SECKEL, DAVID	TFT Board member			0.10		0.10
2.4 Triggering And Filtering	2.4.1 TFT Coordination	UW	PO	KAUER, MATTHEW	TFT Board member			0.10		0.10
2.4 Triggering And Filtering	2.4.1 TFT Coordination	UMD	SC	BLAUFUSS, ERIK	Filter requests, bandwidth, TFT Board Member			0.30		0.30
2.4 Triggering And Filtering	2.4.1 TFT Coordination	UMD	GR	HELLAUER, ROBERT	Prepare datasets for filter testing and common MC datasets for testing		0.10			0.10
2.4 Triggering And Filtering	2.4.1 TFT Coordination	<b>US Total</b>				<b>0.00</b>	<b>0.35</b>	<b>0.60</b>		<b>0.95</b>
2.4 Triggering And Filtering	2.4.1 TFT Coordination	ALBERTA	KE	GRANT, DARREN	TFT Board member				0.10	0.10
2.4 Triggering And Filtering	2.4.1 TFT Coordination	DESY	PO	BERGHAUS, PATRICK	TFT Board member				0.10	0.10
2.4 Triggering And Filtering	2.4.1 TFT Coordination	DESY	PO	KARG, TIMO	TFT Board member				0.10	0.10
2.4 Triggering And Filtering	2.4.1 TFT Coordination	UU	KE	HALLGREN, ALLAN	TFT Board member				0.10	0.10
2.4 Triggering And Filtering	2.4.1 TFT Coordination	UU	KE	DE LOS HEROS, CARLOS	TFT Board member				0.10	0.10
2.4 Triggering And Filtering	2.4.1 TFT Coordination	<b>Non-US Total</b>							<b>0.50</b>	<b>0.50</b>
2.4 Triggering And Filtering	<b>2.4.1 TFT Coordination</b>					<b>0.00</b>	<b>0.35</b>	<b>0.60</b>	<b>0.50</b>	<b>1.45</b>
2.4 Triggering And Filtering	2.4.2 Physics Filters	UA	KE	WILLIAMS, DAWN	Tau WG Chair			0.25		0.25
2.4 Triggering And Filtering	2.4.2 Physics Filters	SBU	KE	KIRYLUK, JOANNA	Cascade WG Co-Chair			0.25		0.25
2.4 Triggering And Filtering	2.4.2 Physics Filters	LBNL	KE	KLEIN, SPENCER	Diffuse WG Co-chair			0.25		0.25
2.4 Triggering And Filtering	2.4.2 Physics Filters	LBNL	PO	CHANG, HYON HA	L2 processing for IC86, studying cascade energy resolution		0.25			0.25
2.4 Triggering And Filtering	2.4.2 Physics Filters	PSU	KE	DEYOUNG, TYCE	Oscillations WG - Co Chair			0.15		0.15
2.4 Triggering And Filtering	2.4.2 Physics Filters	UCB	SC	WOSCHNAGG, KURT	Oscillations WG chair		0.25			0.25
2.4 Triggering And Filtering	2.4.2 Physics Filters	UD	PO	TAMBURRO, ALESSIO	CR-WG Co Chair		0.25			0.25
2.4 Triggering And Filtering	2.4.2 Physics Filters	GTECH	KE	TABOADA, IGNACIO	GRB WG Chair		0.25			0.25
2.4 Triggering And Filtering	2.4.2 Physics Filters	UMD	PO	WISSING, HENRIKE	EHE and Brights WG co-chair		0.25			0.25
2.4 Triggering And Filtering	2.4.2 Physics Filters	SBU	PO	LESIAK-BZDAK, MARIOLA	Cascade filters		0.20			0.20
2.4 Triggering And Filtering	2.4.2 Physics Filters	UWRF	KE	SEUNARINE, SURUJ	Calibration-Flasher Studies			0.20		0.20
2.4 Triggering And Filtering	2.4.2 Physics Filters	<b>US Total</b>				<b>0.00</b>	<b>1.45</b>	<b>1.10</b>	<b>0.00</b>	<b>2.55</b>



IceCube M&O Staffing Matrix sort by WBS v16 2014.0301.xls

WBS L2	WBS L3	Institution	Labor Cat.	Names	Tasks	NSF M&O	NSF Base	U.S.	Europe &	Grand	
						Core	Grants	Institutional	Asia Pacific		
								In-Kind	In-Kind	Total	
2.4 Triggering And Filtering	2.4.2 Physics Filters	SU	KE	BOHM, CHRISTIAN	Track engine				0.10	0.10	
2.4 Triggering And Filtering	2.4.2 Physics Filters	ALBERTA	KE	GRANT, DARREN	Low Energy WG Co-Chair				0.25	0.25	
2.4 Triggering And Filtering	2.4.2 Physics Filters	CHIBA	SC	ISHIHARA, AYA	Diffuse WG co-chair				0.25	0.25	
2.4 Triggering And Filtering	2.4.2 Physics Filters	CHIBA	SC	ISHIHARA, AYA	EHE Filters				0.15	0.15	
2.4 Triggering And Filtering	2.4.2 Physics Filters	DESY	PO	KARG, TIMO	CR WG co-chair				0.25	0.25	
2.4 Triggering And Filtering	2.4.2 Physics Filters	DESY	SC	GORA, DARIUSZ	Online Filter Alerts / NToO program				0.15	0.15	
2.4 Triggering And Filtering	2.4.2 Physics Filters	UC	GR	MUNAWARA, KIRAN	Cascade filters				0.20	0.20	
2.4 Triggering And Filtering	2.4.2 Physics Filters	UU	SC	BOERSMA, DAVID	Maintain Moon shadow and Galactic center filters				0.05	0.05	
2.4 Triggering And Filtering	2.4.2 Physics Filters	SKKU	KE	ROTT, CARSTEN	BSM WG Co-Chair				0.25	0.25	
2.4 Triggering And Filtering	2.4.2 Physics Filters	SKKU	GR	JEONG, DONGVOUNG	Online filter development & testing				0.20	0.20	
2.4 Triggering And Filtering	2.4.2 Physics Filters	SU	KE	FINLEY, CHAD SU	Point Source WG Chair				0.25	0.25	
2.4 Triggering And Filtering	2.4.2 Physics Filters	SU	KE	HULTQVIST, KLAS	Diffuse WG Co-chair				0.25	0.25	
2.4 Triggering And Filtering	2.4.2 Physics Filters	SU	GR	ZOLL, MARCEL	Filters and Simulations				0.15	0.15	
2.4 Triggering And Filtering	2.4.2 Physics Filters	SU	GR	AHRENS, MARYON	PhD-related work				0.10	0.10	
2.4 Triggering And Filtering	2.4.2 Physics Filters	UU	KE	DE LOS HEROS, CARLOS	WIMP WG Chair				0.25	0.25	
2.4 Triggering And Filtering	2.4.2 Physics Filters	VUB	GR	KUNNEN JAN	Filter for mow energy muons				0.50	0.50	
2.4 Triggering And Filtering	2.4.2 Physics Filters	DTMND	KE	RUHE, TIM	Physics filters				0.20	0.20	
2.4 Triggering And Filtering	2.4.2 Physics Filters	DTMND	GR	SCHMITZ, MARTIN	Physics filters				0.20	0.20	
2.4 Triggering And Filtering	2.4.2 Physics Filters	DTMND	GR	SCHERIAU, FLORIAN	Physics filters				0.20	0.20	
2.4 Triggering And Filtering	2.4.2 Physics Filters	WUPPERTAL	KE	HELBING, KLAUS	Exotics- WG chair				0.25	0.25	
2.4 Triggering And Filtering	2.4.2 Physics Filters	WUPPERTAL	GR	WUPPERTAL GR	New SUSY Filter				0.20	0.20	
2.4 Triggering And Filtering	2.4.2 Physics Filters	RWTH	GR	LEIF RADEL	L3 IC86-1/2 diffuse data stream				0.20	0.20	
2.4 Triggering And Filtering	2.4.2 Physics Filters	DPNC	KE	MONTARULI, TERESA	Online filtering				0.10	0.10	
2.4 Triggering And Filtering	2.4.2 Physics Filters	DPNC	PO	AGUILAR SANCHEZ JUAN ANTONIO	Muon filter responsible for 2014, Online filtering				0.10	0.10	
2.4 Triggering And Filtering	2.4.2 Physics Filters	DPNC	PO	AGUILAR SANCHEZ JUAN ANTONIO	Muon working group co-Chair				0.25	0.25	
2.4 Triggering And Filtering	2.4.2 Physics Filters	DPNC	PO	VALLECORSA, SOFIA	DeepCore filtering				0.20	0.20	
2.4 Triggering And Filtering	2.4.2 Physics Filters	DPNC	GR	ASEN, CHRISTOV	Online filtering				0.20	0.20	
2.4 Triggering And Filtering	2.4.2 Physics Filters	DPNC	GR	RAAMEZ MOHAMED	Muon/WIMPs/Low Up Filter				0.20	0.20	
2.4 Triggering And Filtering	2.4.2 Physics Filters	BONN	GR	VOGE, MARKUS	Online L2 Filter				0.20	0.20	
2.4 Triggering And Filtering	2.4.2 Physics Filters	BONN	GR	STASIK, ALEXANDER	Alert System for follow-up				0.20	0.20	
2.4 Triggering And Filtering	2.4.2 Physics Filters	NBI	KE	KOSKINEN, JASON	Low-energy WG Co-Chair				0.25	0.25	
2.4 Triggering And Filtering	2.4.2 Physics Filters	<b>Non-US Total</b>							<b>6.30</b>	<b>6.30</b>	
2.4 Triggering And Filtering	2.4.2 Physics Filters	<b>2.4.2 Physics Filters</b>					<b>0.00</b>	<b>1.45</b>	<b>1.10</b>	<b>6.30</b>	<b>8.85</b>
<b>2.4 Triggering And Filtering</b>	<b>WBS L2 Total</b>						<b>0.00</b>	<b>1.80</b>	<b>1.70</b>	<b>6.80</b>	<b>10.30</b>
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	LBNL	PO	CHANG, HYON HA	DOM simulator & calibrator				0.10	0.10	
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	LBNL	PO	CHANG, HYON HA	Simulation Programs: cmc				0.10	0.10	
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	SUBR	KE	FAZELY, ALI	GEANT Simulation			0.15		0.15	
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	SUBR	SC	XIANWU, XU	Simulation Programs			0.15		0.15	
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	OSU	PO	STAMATIKOS, MICHAEL	GRB Analysis Tools			0.05		0.05	
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	UA	PO	PALCZEWSKI, TOMASZ	Ice simulation			0.35		0.35	
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	UA	GR	PEPPER, JAMES	Dark Matter signal simulation			0.15		0.15	
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	UCB	SC	WOSCHNAGG, KURT	Maintain and Verify Simulation of Photon Propagation and update Ice Properties	0.50				0.50	
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	UD	PO	GONZALEZ, JAVIER	Simulations			0.10		0.10	
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	UD	PO	RUZYBAEV, BAKHTIYAR	Ice Properties Simulation			0.30		0.30	
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	UD	GR	PANDYA, HERSHAL	Simulation Programs: sim-services			0.10		0.10	
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	UD	GR	KOIRALA, RAMESH	Simulation Programs: sim-services			0.10		0.10	
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	UMD	SC	OLIVAS, ALEX	Simulation Software Programs coordinator			0.40		0.40	
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	UMD	PO	WISSING, HENRIKE	Maintain Detector Simulation (IceSim)			0.13		0.13	
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	UMD	GR	RICHMAN, MIKE	Maintain Detector Simulation (IceSim)			0.13		0.13	

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WBS L2	WBS L3	Institution	Labor Cat.	Names	Tasks	NSF M&O Core	NSF Base Grants	U.S. Institutional In-Kind	Europe & Asia Pacific In-Kind	Grand Total
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	UW	SC	CHIRKIN, DMITRY	Maintain and Verify Simulation of Photon Propagation and update Ice Properties	0.35				0.35
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	UW	SC	HOSHINA, KOTOYO	nugen maintenance	0.25				0.25
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	UW	GR	VAN SANTEN, JACOB	Muongun		0.20			0.20
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	UW	PO	KOPPER, CLAUDIO	Direct photon propagation, IceTray, Simulations, Genie		0.25			0.25
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	UW	GR	RIEDEL, BENEDICT	Supernova DAQ, simulation		0.20			0.20
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	UW	GR	JERO, KYLE	Veto simulation		0.20			0.20
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	UW	DH	DIAZ-VELEZ, JUAN CARLOS	Maintain Simulation Production Software, maintain, test and update physics aspects of the atmospheric muon and neutrino simulation	0.20				0.20
<b>US Total</b>						<b>1.30</b>	<b>2.40</b>	<b>0.75</b>		<b>4.45</b>
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	DTMND	GR	FACHS, THOMAS	PROPOSAL-IceProd integration and maintenance/support				0.50	0.50
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	SU	GR	FLIS, SAMUEL	DOM simulation				0.15	0.15
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	UOX	KE	SARKAR, SUBIR	Yellow Book-maintenance				0.10	0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	GENT	GR	UGENT GR	Support IceTop Simulations, IceTop Calibrations, IceTop Reconstruction				0.40	0.40
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	BOCHUM	KE	TJUS, JULIA	Development PROPOSAL simulation software				0.10	0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	BOCHUM	GR	SCHÖNEBERG, SEBASTIAN	Monte Carlo Production				0.10	0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	BOCHUM	GR	SCHÖNEBERG, SEBASTIAN	Developing / maintaining ANFlux				0.10	0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	NBI	GR	LARSON, MICHAEL	Correlated Noise simulation				0.20	0.20
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	NBI	GR	MEDICI, MORTEN	Absolute energy calibration of low-energy interactions				0.20	0.20
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	ERLANGEN	GR	CLASSEN, LEW	multi-PMT DOM development and simulations				0.40	0.40
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	BONN	KE	KOWALSKI, MAREK	Simulation tools				0.05	0.05
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	RWTH	GR	LEIF RADEL	Light yield				0.05	0.05
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.1 Simulation Programs	RWTH	GR	SEBASTIAN SCHÖNEN	Global Likelihood Fits, KDE-tools				0.10	0.10
<b>Non-US Total</b>									<b>2.45</b>	<b>2.45</b>
<b>2.5.1 Simulation Programs</b>						<b>1.30</b>	<b>2.40</b>	<b>0.75</b>	<b>2.45</b>	<b>6.90</b>
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	LBNL	GR	MIARECKI, SANDRA	Algorithm for measuring muon energy		0.25			0.25
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	LBNL	GR	BINDER, GARY	PMT saturation corrections for analysis		0.50			0.50
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	PSU	PO	JOAO PEDRO DE ANDRES	Low energy reconstruction techniques for DeepCore		0.10			0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	PSU	PO	ARLEN, TIM	Develop analysis tools for systematics study		0.10			0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	PSU	PO	TESIC, GORDANA	Integrate IceCube into AMON			0.50		0.50
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	PSU	GR	DUNKMAN, MATT	develop starting track reconstruction - hybrid reco.		0.47			0.47
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	SUBR	KE	FAZELY, ALI	Reconstruction/ Analysis tools			0.15		0.15
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	SUBR	SC	XIANWU, XU	Reconstruction/ Analysis tools			0.15		0.15
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	UA	KE	TOALE, PATRICK	Double cascade fitter			0.05		0.05
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	UA	GR	XU, DONGLIAN	Improvements to low energy analysis framework		0.10			0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	UD	PO	GONZALEZ, JAVIER	Event reconstruction		0.25			0.25
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	UAA	KE	RAWLINS, KATHERINE	Laptop and software development; Snow correction for IceTop			0.30		0.30
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	UMD	PO	WISSING, HENRIKE	develop & test reconstruction		0.13			0.13
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	UMD	GR	RICHMAN, MIKE	Reconstruction/ Analysis tools		0.13			0.13
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	SBU	KE	KIRYLUK, JOANNA	BadDomList software maintenance			0.05		0.05
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	SBU	GR	NIEDERHAUSEN, HANS	Standard Candle		0.10			0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	SBU	GR	NIEDERHAUSEN, HANS	Flashers		0.10			0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	SBU	GR	NIEDERHAUSEN, HANS	Cascade reconstruction		0.10			0.10

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WBS L2	WBS L3	Institution	Labor Cat.	Names	Tasks	NSF M&O Core	NSF Base Grants	U.S. Institutional In-Kind	Europe & Asia Pacific In-Kind	Grand Total
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	UW	SC	CHIRKIN, DMITRY	Reconstruction software	0.15				0.15
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	UW	SC	CHIRKIN, DMITRY	Direct photon tracking / iceproperties calibration; FE/pulse extractor; reco S/W		0.15			0.15
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	UW	PO	NEILSON, NAOKO	Point source coordinator		0.20			0.20
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	UW	GR	GLADSTONE, LAURA	Reconstruction tools-Deep Core		0.15			0.15
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	UW	GR	FEINTZIG, JACOB	Event reconstruction (spline fits)		0.10			0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	UW	GR	VAN SANTEN, JACOB	Cascades		0.15			0.15
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	UW	GR	JERO, KYLE	Event reconstruction, angular resolution		0.20			0.20
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	UWRF	KE	MADSEN, JIM	Low-energy IceTop Extensions			0.10		0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	UWRF	KE	SEUNARINE, SURUJ	Low-Energy Extensions of IceTop			0.10		0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	<b>US Total</b>					<b>0.15</b>	<b>3.27</b>	<b>1.40</b>	<b>4.82</b>
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	ADELAIDE	KE	HILL, GARY	Event energy and direction reconstruction, millipede				0.40	0.40
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	ADELAIDE	PO	WHELAN, BEN	Event energy and direction reconstruction, millipede				1.00	1.00
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	ADELAIDE	GR	AARTSEN, MARK	Event energy and direction reconstruction, millipede				0.50	0.50
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	ALBERTA	GR	WOOD, TANIA	Calibrations with LED and minimum ionizing muons				0.35	0.35
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	CHIBA	KE	YOSHIDA, SHIGERU	Maintain Romeo, EHE Simulations, Calibration using Standard Candles				0.20	0.20
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	CHIBA	KE	KEIICHI MASE	Maintain Romeo, EHE Simulations, Maintain reconstruction projects (Portia), MC/Data comparison for EHE-filtered and IceTop events, Standard Candle Analysis				0.20	0.20
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	CHIBA	SC	ISHIHARA, AYA	Maintain Portia and the SC data filtering				0.15	0.15
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	CHIBA	PO	RELICH, MATTHEW	Standard Candle data analysis for calibrating DOM and ice				0.15	0.15
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	CHIBA	PO	GAIOR, ROMAIN	EHE online pipeline for gamma-ray follow-up				0.15	0.15
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	CHIBA	GR	CHIBA GR	Improve the Ice Model, Afterpulse Simulator, Standard Candle Analysis, Maintain reconstruction projects (Ophelia, ehe-star)				0.20	0.20
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	DESY	GR	MOHRMANN, LARS	Likelihood fit package				0.10	0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	UU	SC	BOERSMA, DAVID	Reconstruction Coordinator				0.20	0.20
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	RWTH	GR	BLUMENTHAL, JAN	IceCube integration in Fittino/Astrofit				0.10	0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	RWTH	GR	VEHRING, MARKUS	Genie MC development & data production				0.20	0.20
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	RWTH	GR	WALLRAFF, MARIUS	Finite track reconstruction				0.10	0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	RWTH	GR	WALLRAFF, MARIUS	nuCraft				0.20	0.20
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	SKKU	PO	BOSE, DEBANJAN	Photon tracking / ice-properties calibration				0.20	0.20
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	SU	GR	WOLF, MARTIN	STTools, EventViewer				0.20	0.20
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	VUB	KE	VAN EIJNDHOVEN, NICK	development of reconstruction tools (IcePack framework)				0.25	0.25
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	VUB	PO	DE VRIES, KRIJN	muon track reconstruction in IceCube and DeepCore				0.25	0.25
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	VUB	PO	Lünemann, Jan	Low energy muon reconstruction				0.25	0.25
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	VUB	GR	MAGGI, GIULIANO	muon track reconstruction in IceCube and DeepCore				0.25	0.25
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	VUB	PO	GOLUP, GERALDINA	muon track reconstruction for IceCube and DeepCore				0.25	0.25
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	VUB	GR	CASIER MARTIN	muon track reconstruction in IceCube and DeepCore				0.50	0.50
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	VUB	GR	BRAYEUR LIONEL	muon track reconstruction in IceCube and DeepCore				0.50	0.50
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	ALBERTA	KE	GRANT, DARREN	Maintenance of IceCube-Photonics interface				0.10	0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	WUPPERTAL	GR	WUPPERTAL GR	New SUSY Reconstruction, Simulation, Propagation, Monopole, Photonics, muon detection with IceTop				0.60	0.60
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	MAINZ	GR	WIEBE, KLAUS	Angular res. Cascades				0.20	0.20
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	HUMBOLDT	GR	DE WITH, MEIKE	Reconstruction Release Manager, Maintain Reconstruction Framework				0.25	0.25
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	ERLANGEN	GR	ALTMANN, DAVID	Track reconstruction				0.10	0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	NBI	KE	KOSKINEN, JASON	DeepCore Veto				0.10	0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	NBI	GR	SANDROOS, JOAKIM	Particle identification in PINGU				0.40	0.40
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	Toronto	KE	CLARK, KENNETH	Development of low-energy reconstruction techniques				0.10	0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	BONN	GR	UBONN GR	Reconstruction/ Analysis tools				0.20	0.20

IceCube M&O Staffing Matrix sort by WBS v16 2014.0301.xls

WBS L2	WBS L3	Institution	Labor Cat.	Names	Tasks	NSF M&O Core	NSF Base Grants	U.S. Institutional In-Kind	Europe & Asia Pacific In-Kind	Grand Total
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	BONN	GR	VOGE, MARKUS	Reconstruction				0.10	0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	BONN	GR	USNER, MARCEL	Reconstruction/ Analysis tools				0.20	0.20
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.2 Reconstruction/ Analysis Tools	<b>Non-US Total</b>							<b>9.20</b>	<b>9.20</b>
2.5 Data Quality, Reconstruction & Simulation Tools	<b>2.5.2 Reconstruction/ Analysis Tools</b>					<b>0.15</b>	<b>3.27</b>	<b>1.40</b>	<b>9.20</b>	<b>14.02</b>
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.3 Data Quality	<b>US Total</b>				<b>0.00</b>	<b>0.00</b>	<b>0.00</b>		<b>0.00</b>
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.3 Data Quality	TUM	PO	MPI PO	Data Quality & DeepCore				0.60	0.60
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.3 Data Quality	DPNC	GR	ASEN, CHRISTOV	Data and Simulation Quality				0.30	0.30
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.3 Data Quality	DPNC	GR	RAAMEZ MOHAMED	Data and Simulation Quality				0.30	0.30
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.3 Data Quality	DPNC	PO	AGUILAR SANCHEZ JUAN ANTONIO	Data and Simulation Quality				0.15	0.15
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.3 Data Quality	DPNC	PO	VALLECORSA, SOFIA	Data and Simulation Quality for low energy searches				0.30	0.30
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.3 Data Quality	VUB	KE	VAN EIJNDHOVEN, NICK	data quality verification				0.25	0.25
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.3 Data Quality	VUB	PO	GOLUP, GERALDINA	GRB analysis				0.25	0.25
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.3 Data Quality	VUB	GR	MAGGI, GIULIANO	AGN analysis				0.25	0.25
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.3 Data Quality	VUB	PO	DE VRIES, KRIJN	GRB/AGN analysis				0.25	0.25
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.3 Data Quality	<b>Non-US Total</b>							<b>2.65</b>	<b>2.65</b>
2.5 Data Quality, Reconstruction & Simulation Tools	<b>2.5.3 Data Quality</b>					<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>2.65</b>	<b>2.65</b>
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.4 Offline Data Processing	UW	DH	FADIRAN, OLADIPO	Simulation Production Coordination; production configurations, test production and web portal.	0.60				0.60
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.4 Offline Data Processing	UW	PO	KOPPER, CLAUDIO	L2 processing support		0.30			0.30
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.4 Offline Data Processing	UW	PO	NEILSON, NAOKO	L2 Offline Processing	0.25				0.25
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.4 Offline Data Processing	UW	GR	FEINTZIG, JACOB	L2 processing, muon stream		0.10			0.10
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.4 Offline Data Processing	<b>US Total</b>				<b>0.85</b>	<b>0.40</b>	<b>0.00</b>		<b>1.25</b>
2.5 Data Quality, Reconstruction & Simulation Tools	2.5.4 Offline Data Processing	<b>Non-US Total</b>							<b>0.00</b>	<b>0.00</b>
2.5 Data Quality, Reconstruction & Simulation Tools	<b>2.5.4 Offline Data Processing</b>					<b>0.85</b>	<b>0.40</b>	<b>0.00</b>	<b>0.00</b>	<b>1.25</b>
<b>2.5 Data Quality, Reconstruction &amp; Simulation Tools</b>	<b>WBS L2 Total</b>					<b>2.30</b>	<b>6.07</b>	<b>2.15</b>	<b>14.30</b>	<b>24.82</b>
<b>Grand Total</b>						<b>35.58</b>	<b>12.78</b>	<b>8.79</b>	<b>37.07</b>	<b>94.21</b>