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Through Space and Time

JAMES JEANS





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THROUGH SPACE & TIME



THROUGH SPACE & TIME

BY

SIR JAMES JEANS M.A., D.Sc., Sc.D., LL.D., F.R.S.

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ROYAL INSTITUTION LECTURES
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PREFACE

Every year for more than a century, the Royal Institution has invited some man of science to deliver a course of lectures at Christmastide in a style "adapted to a juvenile auditory". In practice, this rather quaint phrase means that the lecturer will be confronted with an eager and critical audience, ranging in respect of age from under eight to over eighty, and in respect of scientific knowledge from the aforesaid child under eight to staid professors of science and venerable Fellows of the Royal Society, each of whom will expect the lecturer to say something that will interest him.

The present book contains the substance of what I said when I was honoured with an invitation of this kind for the Christmas season 1933-4, fortified in places with what I have said on other slightly more serious occasions, both at the Royal Institution and elsewhere.

It is a pleasure to acknowledge many courtesies and return thanks for much valuable help. I am indebted to Sir T. L. Heath for permission to borrow largely from his *Greek Astronomy* and other books; to many Institutions, Publishers and private individuals for the loan of negatives, prints, blocks, etc., and permission to reproduce these in my book—detailed acknowledgment is made in the List of Illustrations. Finally, I have



vi

to thank Sir Thomas Heath and my sister, Gertrude Jeans, for help in reading the proofs, and the staff of the Cambridge University Press for their usual careful help in producing the book.

Preface

J. H. JEANS

Dorking August 1934



CONTENTS

PREFACE			PAGE V
LIST OF ILL	USTR	ATIONS	ix
CHAPTER I	THE	EARTH	I
II	THE	AIR	48
III	THE	SKY	77
IV	THE	MOON	107
v	THE	PLANETS	124
VI	THE	SUN	156
VII	THE	STARS	173
VIII	THE	NEBULAE	203
INDEX			219



LIST OF ILLUSTRATIONS

	FIG.		PAGE
	I	Eratosthenes and the size of the earth	9
PLATE	2	Interior of the earth as conjectured from earth- quake waves	18
Ι	{3 4	The essential parts of a Seismograph Seismograph Record (From photographs by J. J. Shaw)	facing 20
II	{5 6	Black slate and limestone near Oban Lava south of Ballantrae (Reproduced by permission of the Director of the Geological Striain. Crown copyright reserved) 7, 7b Illustrating Wegener's theory that the primitive continents formed continuous land	,, 2I Survey of Great 26 and 27
Ш	$\begin{cases} 8 \\ 9 \end{cases}$	Wastwater scree, Cumberland (Cambridge County Geography) Striations on Eglwyseg (Reproduced by permission of the Director of the Geological Striatin. Crown copyright reserved)	facing 28 Survey of Great
IV	10	Colorado River Cañon (From Mather's "Old Mother Earth", by permission of the Har	facing 29
	11 12	Geological layers, Snowdon to Harwich Geological layers, Woburn to the Weald of Sussex	30
V	{13 14	A "Fault" in Sandstone (Reproduced by permission of the Director of the Geological Statian. Crown copyright reserved) The halo produced by radioactive substance in (From J. Joly, "The Surface of the Earth", by permission of the Oxford)	facing 36 Survey of Great
VI	\begin{cases} 15 \\ 16 \end{cases}	The oldest known fossils (From Mather's "Old Mother Earth", by permission of the Ha Press) Fossils in Cambrian rocks	
		(From "The Universal History of the World", Amalgamated P.	ress, Lta)



x		List of Illustrations		
plate VII	FIG. 17	Fossils of the Silurian period (From "The Universal History of the World", Amalgamated Pres	facing	GE 38
VIII	{18	Dimetrodon Gigas (From "Monsters of Primaeval Days" by W. E. Swinton, by Mondiale) Cacops Aspidophorus		
IX	{ ²⁰ ₂₁	(From "The Universal History of the World", Amalgamated Pres Triceratops Prorsus (After a model by V. Edwards, from "The Dinosaurs" by W. I. permission of Messrs Thomas Murby and Co.) Scolosaurus (From "The Universal History of the World", Amalgamated Peconstruction based on material supplied by Professor D. M. S. Wa	facing E. Swinton	, by
X	$\begin{cases} 22 \\ 23 \end{cases}$	Pteranodon occidentalis (By permission of the Director of the British Museum) Diplodocus (After a model by V. Edwards, from "The Dinosaurs" by W. permission of Messrs Thomas Murby and Co.)	facing	43
XI	$\begin{cases} 24 \\ 25 \end{cases}$	Cetiosaurus (By permission of the Director of the British Museum) Arsinoitherium (From "Monsters of Primaeval Days" by W. E. Swinton, by Mondiale)	facing permissio	
XII	$\begin{cases} 26 \\ 27 \end{cases}$	Machaerodus (From "The Universal History of the World", Amalgamated Pro Megatherium (From "Monsters of Primaeval Days" by W. E. Swinton, by Mondiale)		
	28 29	Principal events of the past history of the earth Central part of the scale of radiation		46 55
XIII	{30 31	Cirrus Clouds Clouds and Fog in the Rhone Valley (From "Clouds and Weather Phenomena" by C. J. P. Cave)	facing	68
XIV	$\begin{cases} 32 \\ 33 \end{cases}$	A "draped" Aurora An Aurora with vertical streamers (From "Album of Photographs and Sketches of the National Anta 1901-4", by permission of the Royal Society)	,, rctic Expe	69 dition
	34	Exploring the atmosphere		72



	List of Illustrations	xi
PLATE	FIG.	PAGE
XV	35 A flat-iron photographed by its own heat-radiation 36 Bowen Island photographed by ordinary light 37 Bowen Island photographed by infra-red radiation (By permission of Ilford Co.)	facing 76
XVI	38 Brooks' Comet (Photograph by Helwan Observatory) 39 Comet III of 1908 (Photograph by E. E. Barnard, Yerkes Observatory)	,, 77
	40 The distances of the sun and moon	81
	41 a Constellations north of the ecliptic	92
	41 b Constellations south of the ecliptic (By permission of Messrs Gall and Inglis)	93
	42 The scale of brightness	97
	43 The phases of Venus	100
XVII	 The Hoba meteorite Iron meteorites in S.W. Africa (From photographs by Professor W. T. Gordon) 	facing 102
XVIII	46, 47 Meteor Crater near Cañon Diablo (From photographs by D. M. Barringer reproduced in "The Journal")	,, IO3 Geographical
XIX	48, 49 The Henbury Craters (From photographs by A. R. Alderman reproduced in "The Magazine")	facing 106 Mineralogical
XX	50 The moon, $12\frac{1}{2}$ days old (Photograph by E. Puiseux, Paris Observatory)	facing 107
XXI	51 Part of the Northern half of the moon	,, 110
XXII	52 Part of the Southern half of the moon	,, 111
XXIII	53 Eastern edge of the moon	" 112
XXIV	54 The Crater Copernicus (Plates XXI-XXIV from photographs taken at Mount Wilson of permission of the Carnegie Institution of Washington)	,, II3 Observatory, by



xii	List of Illustrations		
PLATE XXV	FIG. 55 The Lunar Apennines and Archimedes (From "The Moon" by J. Nasmyth and J. Carpenter, by permissing Murray)	facing	
XXVI	56 The crater Plato 57 The mountain Pico (From "The Moon" by J. Nasmyth and J. Carpenter, by permiss. Murray)	facing ion of Mr	
XXVII	58 Lunar scenery So A typical lunar landscape (From "The Moon" by J. Nasmyth and J. Carpenter, by permiss Murray)	facing	
XXVIII	60 Relative sizes of the sun and planets (Photograph by the Mount Wilson Observatory) 61 Venus in ultra-violet and infra-red light 62 Mars in ultra-violet and infra-red light (Photographs by W. H. Wright, Lick Observatory)	facing	124
XXIX	63, 64 "Canals on Mars" (By permission of the Royal Astronomical Society)	,,	144
XXX	65 Surface detail of Mercury 66 Jupiter in ultra-violet and blue light (Photograph taken at Mount Wilson Observatory) 67 Saturn with its system of rings (Photograph by E. E. Barnard, Yerkes Observatory)	,,	145
	68 Tidal force exerted by the moon		150
XXXI	69 The sun, August 12, 1917 (Photograph taken at Greenwich Observatory)	facing	156
XXXII	 70 Douglas fir shewing variations of climate 71 Scotch Pine shewing relation between rings and sunspots (Photographs by A. E. Douglass, University of Arizona) 	,,	157
	72 Sunspots and the height of water in Lake Victoria Nyanza (By permission of the Royal Meteorological Society)		159



		List of Illustrations	;	xiii
PLATE XXXIII	FIG. 73	Development of sunspots (Photographs taken at Mount Wilson Observatory)	facing ^P	PAGE 160
XXXIV	74	A group of sunspots (Photographs taken at Greenwich Observatory)	,,	161
XXXV	75	An eruptive prominence, November 19, 1928 (Photographs taken at Kodaikanal Observatory)	3 ,,	162
XXXVI	76	The development of a solar prominence (Photographs taken at Meudon Observatory)	,,	163
XXXVII	77	The solar corona	,,	164
XXXVIII	78	The solar corona (Photographs taken by A. C. de la C. Crommelin, Greenwich	,, Observatory)	165
XXXIX	79-83	Spectra of the sun and other stars (Photographs by W. Huggins and by the Yerkes Observatory)	facing	166
XL	84	The sun in hydrogen light	,,	167
XLI	85	Group of sunspots in hydrogen light	**	170
XLII	{86 {87	, , ,	,, Observatory)	171
XLIII	\begin{cases} 88 \\ 89 \end{cases}	Portrait of a Hottentot by infra-red and or dinary light (By permission of Ilford Co.) A potato leaf in infra-red and ordinary light (Photograph by F. C. Bawden, by permission of Ilford Co.)	- facing	186
XLIV	90 91	Star-fish by X-radiation Poppy-heads by X-radiation (Photographs by Herbert Flower, by permission of Ilford Co.)	,,	187
XLV	$\begin{cases} 9^2 \\ 93 \end{cases}$	The binary system, Kruger 60 (Photograph by E. E. Barnard, Yerkes Observatory) Part of Auriga to ninth magnitude stars	following	196



xiv		List of Illustrations		
PLATE XLVI	FIG. 94 95	The same to twelfth magnitude stars The same to fifteenth magnitude stars	following	196
XLVII	{96 97	The same to eighteenth magnitude stars The same to twentieth magnitude stars	,,	196
XLVIII	∫98 ∫99	Three planetary nebulae (Figures 93-98 from photographs taken at Mount Wilson Ob The nebulosity surrounding the stars of th Pleiades (Photograph: Kerolyr, Forcalquier)	facing servatory) ne	204
XLIX	100	The nebulosity round a star in Auriga	facing	205
L	101	Nebulosity in Sobieski's shield (Photograph, taken at Mount Wilson Observatory)	,,	206
LI	102	Nebulosity in Orion (Photograph: Kerolyr, Forcalquier)	,,	207
LII	103 104 105	The "whirlpool" nebula in Canes Venatici (Photograph taken at Mount Wilson Observatory) The great nebula in Andromeda (Photograph taken at Yerkes Observatory) A nebula in Berenice's Hair	"	208
LIII	106	A group of nebulae in Pegasus (Photographs taken at Mount Wilson Observatory)	,,	209