

The Skeptic Zone

Show 244 - 23 June 2013



Maynard

1  
00:00:22,300 --> 00:00:09,080  
welcome to the skeptic zone the podcast

2  
00:00:29,839 --> 00:00:25,189  
hello and welcome to the skeptics are an

3  
00:00:33,259 --> 00:00:29,849  
episode number 244 for the 23rd of jun

4  
00:00:36,170 --> 00:00:33,269  
2013 Richard Saunders here with you from

5  
00:00:39,040 --> 00:00:36,180  
Sydney Australia being swept away by the

6  
00:00:42,250 --> 00:00:39,050  
wind and the rain Cindy as being

7  
00:00:44,990 --> 00:00:42,260  
buffeted buffeted by all manner of

8  
00:00:47,299 --> 00:00:45,000  
storms and floods and rain and I think

9  
00:00:49,549 --> 00:00:47,309  
there's worse to come but before we get

10  
00:00:50,780 --> 00:00:49,559  
on to what's on this week so a big thank

11  
00:00:53,869 --> 00:00:50,790  
you to all those people who have been

12  
00:00:57,979 --> 00:00:53,879  
writing to me wishing me well with my

13  
00:01:01,729 --> 00:00:57,989

ongoing sinus infection so many people

14

00:01:05,479 --> 00:01:01,739

encouraging me to take homeopathy well

15

00:01:07,999 --> 00:01:05,489

gee thanks people I'm certainly looking

16

00:01:10,399 --> 00:01:08,009

forward to getting better soon any way

17

00:01:13,310 --> 00:01:10,409

to kick off this week's show maynards

18

00:01:15,830 --> 00:01:13,320

spooky action made out of myself well

19

00:01:18,999 --> 00:01:15,840

lucky enough to attend thee well the

20

00:01:22,580 --> 00:01:19,009

sydney farewell party of Cosmos magazine

21

00:01:24,800 --> 00:01:22,590

cosmos magazine is pulling up its stakes

22

00:01:28,399 --> 00:01:24,810

here in sydney and moving to melbourne

23

00:01:31,969 --> 00:01:28,409

may not interviews are departing editor

24

00:01:33,380 --> 00:01:31,979

off cosmos magazine wilson de silva now

25

00:01:35,300 --> 00:01:33,390

we've been following the progress of

26  
00:01:37,789 --> 00:01:35,310  
Cosmos magazine very carefully over the

27  
00:01:40,450 --> 00:01:37,799  
years at the Australian Skeptics and the

28  
00:01:43,550 --> 00:01:40,460  
Skeptic Zone a wonderful magazine and

29  
00:01:45,520 --> 00:01:43,560  
well Wilson gives Maynard his

30  
00:01:49,430 --> 00:01:45,530  
impressions on the whole magazine

31  
00:01:51,260 --> 00:01:49,440  
business scientific journalism following

32  
00:01:52,850 --> 00:01:51,270  
that it's a week in science without good

33  
00:01:55,789 --> 00:01:52,860  
friend Dr. Paul Willis from the Royal

34  
00:01:58,370 --> 00:01:55,799  
Institution of Australia and this week I

35  
00:02:00,440 --> 00:01:58,380  
think he covers the the interesting news

36  
00:02:03,380 --> 00:02:00,450  
I've sort of been following it as well

37  
00:02:05,390 --> 00:02:03,390  
and no doubt you may have heard this too

38  
00:02:09,279 --> 00:02:05,400

but they have discovered a way to had

39

00:02:12,280 --> 00:02:09,289

even more data onto a DVD some

40

00:02:14,929 --> 00:02:12,290

stupefyingly huge amount of data

41

00:02:18,320 --> 00:02:14,939

interesting stuff and after that we have

42

00:02:21,490 --> 00:02:18,330

a guest editorial a guest editorial from

43

00:02:23,869 --> 00:02:21,500

sharon hill from doubtful news com

44

00:02:26,690 --> 00:02:23,879

sharon wrote a very interesting piece

45

00:02:30,110 --> 00:02:26,700

called quoted and someone wants to tell

46

00:02:32,420 --> 00:02:30,120

me their paranormal story she says

47

00:02:35,360 --> 00:02:32,430

one of the hazards of being a skeptic

48

00:02:36,949 --> 00:02:35,370

about paranormal subjects is that those

49

00:02:39,800 --> 00:02:36,959

who have had their own personal

50

00:02:43,130 --> 00:02:39,810

experiences or investigated a peculiar

51  
00:02:46,100 --> 00:02:43,140  
case like to play stumped the skeptic

52  
00:02:48,259 --> 00:02:46,110  
that editorial our guest editorial who's

53  
00:02:50,330 --> 00:02:48,269  
sharon hill coming up a bit later on in

54  
00:02:53,990 --> 00:02:50,340  
the skeptic zone and to round off the

55  
00:02:56,690 --> 00:02:54,000  
show it's dr. rachy reports dr. Richie

56  
00:02:58,880 --> 00:02:56,700  
will be talking to dr. david hawks who

57  
00:03:01,699 --> 00:02:58,890  
is a medical virologist at the flory

58  
00:03:04,160 --> 00:03:01,709  
institute in melbourne now dr. Hawks

59  
00:03:07,220 --> 00:03:04,170  
will be talking to dr. Richie about the

60  
00:03:08,990 --> 00:03:07,230  
HPV vaccine a fascinating interview a

61  
00:03:11,210 --> 00:03:09,000  
fascinating interview and a bit strange

62  
00:03:14,300 --> 00:03:11,220  
because as we discovered during the

63  
00:03:16,550 --> 00:03:14,310

course of the interview dr. Hawks dog is

64

00:03:19,309 --> 00:03:16,560

chewing on some cables or playing near

65

00:03:21,380 --> 00:03:19,319

the computer so you'll hear some pops

66

00:03:24,199 --> 00:03:21,390

and squeaks and scrapes along the way

67

00:03:26,509 --> 00:03:24,209

please forgive those it's worth it just

68

00:03:28,280 --> 00:03:26,519

to hear the interview anyway with the

69

00:03:30,199 --> 00:03:28,290

rain oh no here it comes again with the

70

00:03:33,640 --> 00:03:30,209

rain pelting outside the window it's

71

00:03:37,129 --> 00:03:33,650

time for me to run downstairs have a

72

00:03:41,120 --> 00:03:37,139

curry curried vegetables with peanuts

73

00:03:43,729 --> 00:03:41,130

and sesame oil if that doesn't knock

74

00:03:46,069 --> 00:03:43,739

this sinus infection on the head nothing

75

00:04:02,460 --> 00:03:46,079

will well I'm doing that I hope you

76

00:04:11,030 --> 00:04:07,660

here's may not spooky action at the

77

00:04:15,780 --> 00:04:13,920

well people I'm at one of these dues

78

00:04:17,610 --> 00:04:15,790

that are they do that you want to go to

79

00:04:20,060 --> 00:04:17,620

the number one on the Sydney social

80

00:04:22,830 --> 00:04:20,070

calendar tonight is the cosmos is

81

00:04:24,360 --> 00:04:22,840

pinging off from Sydney launch is that

82

00:04:26,460 --> 00:04:24,370

what it is how do we describe this ten

83

00:04:28,710 --> 00:04:26,470

years of that we're here for Wilson

84

00:04:30,510 --> 00:04:28,720

that's right it's um it's the end of the

85

00:04:33,450 --> 00:04:30,520

Sydney chapter of cosmos and onto the

86

00:04:36,720 --> 00:04:33,460

Melbourne chapter where the our partners

87

00:04:39,960 --> 00:04:36,730

Alan and Lizzy Finkel our have bought it

88

00:04:42,450 --> 00:04:39,970

off us Kylie Ahern and I will service

89

00:04:44,250 --> 00:04:42,460

will establish that card not quite ten

90

00:04:46,230 --> 00:04:44,260

years eight years almost nine years ago

91

00:04:48,000 --> 00:04:46,240

so you'll let the larry flynt of science

92

00:04:50,010 --> 00:04:48,010

publishing it in australia is that right

93

00:04:52,230 --> 00:04:50,020

only I'm not in a wheelchair and we

94

00:04:53,820 --> 00:04:52,240

don't without that revealing well it has

95

00:04:55,350 --> 00:04:53,830

to be said just had a shot at you

96

00:04:57,180 --> 00:04:55,360

everything it has to be said we are

97

00:04:58,950 --> 00:04:57,190

still the only site in the only magazine

98

00:05:01,710 --> 00:04:58,960

in the world were published an erect

99

00:05:03,150 --> 00:05:01,720

penis on the cover and at what however

100

00:05:05,909 --> 00:05:03,160

it wasn't a human species it was a

101  
00:05:07,770 --> 00:05:05,919  
beetle penis and we have no we and we

102  
00:05:10,409 --> 00:05:07,780  
have published we have published breasts

103  
00:05:12,540 --> 00:05:10,419  
always in a discussion of course of

104  
00:05:13,980 --> 00:05:12,550  
science and therefore you know people

105  
00:05:16,050 --> 00:05:13,990  
say hey you know this is not racy so

106  
00:05:17,310 --> 00:05:16,060  
answers on Tracy it's very sexy it's

107  
00:05:18,390 --> 00:05:17,320  
full of interesting stuff you just have

108  
00:05:19,740 --> 00:05:18,400  
to know what you look for and it's full

109  
00:05:21,240 --> 00:05:19,750  
of controversy what's the most

110  
00:05:22,830 --> 00:05:21,250  
controversial thing you've been involved

111  
00:05:26,510 --> 00:05:22,840  
in publishing during the history of

112  
00:05:31,830 --> 00:05:26,520  
Cosmos so far look when Simon Singh got

113  
00:05:34,710 --> 00:05:31,840

done for for the attack on the the

114

00:05:36,570 --> 00:05:34,720

chiropractor's he wrote an article for

115

00:05:38,159 --> 00:05:36,580

The Guardian that was considered

116

00:05:39,779 --> 00:05:38,169

libelous and he spent a quite a bit of

117

00:05:42,840 --> 00:05:39,789

money in defending that we thought it

118

00:05:45,600 --> 00:05:42,850

was an important issue to show that

119

00:05:47,159 --> 00:05:45,610

science writers can write something that

120

00:05:49,740 --> 00:05:47,169

is critical at but unfortunately under

121

00:05:51,090 --> 00:05:49,750

British libel laws they can get done but

122

00:05:53,400 --> 00:05:51,100

you can't get done on the Australian

123

00:05:55,379 --> 00:05:53,410

laws in the same sort of saying the same

124

00:05:58,350 --> 00:05:55,389

thing so we'll republish the article and

125

00:05:59,550 --> 00:05:58,360

when we proposed at the simon he said

126  
00:06:01,140 --> 00:05:59,560  
they actually been approached by some

127  
00:06:03,830 --> 00:06:01,150  
other blogs so we turn it into a

128  
00:06:06,930 --> 00:06:03,840  
national international day of action and

129  
00:06:08,850 --> 00:06:06,940  
cosmos led the publication of that

130  
00:06:10,800 --> 00:06:08,860  
article along with a thousand other

131  
00:06:13,150 --> 00:06:10,810  
blogs around the world and we all said

132  
00:06:15,610 --> 00:06:13,160  
so sue us

133  
00:06:18,070 --> 00:06:15,620  
and have you actually got many cease and

134  
00:06:19,600 --> 00:06:18,080  
desist letters at the cosmos over the

135  
00:06:22,630 --> 00:06:19,610  
years now we haven't in fact like most

136  
00:06:24,820 --> 00:06:22,640  
science magazines we get theories of

137  
00:06:26,260 --> 00:06:24,830  
physics theories of you know that

138  
00:06:28,300 --> 00:06:26,270

explains why the speed of light should

139

00:06:30,040 --> 00:06:28,310

be X and you know but basically it's

140

00:06:31,510 --> 00:06:30,050

lots of fun to go through them my

141

00:06:34,300 --> 00:06:31,520

favorite one was the one that was

142

00:06:36,540 --> 00:06:34,310

written in in red very closely spaced

143

00:06:38,770 --> 00:06:36,550

both sides of the paper and in Spanish

144

00:06:41,500 --> 00:06:38,780

and you put all these in a box somewhere

145

00:06:43,300 --> 00:06:41,510

is a magic box we used to you know it

146

00:06:46,480 --> 00:06:43,310

was lost him one of the ships of

147

00:06:48,670 --> 00:06:46,490

officers it was lost in to me to my you

148

00:06:49,930 --> 00:06:48,680

know I really missed that because there

149

00:06:52,360 --> 00:06:49,940

was some really freaky stuff in that

150

00:06:53,710 --> 00:06:52,370

some stuff from Romania from and then

151

00:06:55,540 --> 00:06:53,720

this one in which is written in Spanish

152

00:06:58,960 --> 00:06:55,550

and luckily I can't read spanish the

153

00:07:00,940 --> 00:06:58,970

what it said in spanish was it very much

154

00:07:03,340 --> 00:07:00,950

enjoyed your series on the planets I'm

155

00:07:05,980 --> 00:07:03,350

wondering if you can help me I visited a

156

00:07:07,000 --> 00:07:05,990

planet recently and here's the

157

00:07:08,710 --> 00:07:07,010

description I was wondering if you could

158

00:07:10,840 --> 00:07:08,720

tell me which planet it might be and it

159

00:07:12,400 --> 00:07:10,850

was a in our solar system or not as far

160

00:07:15,160 --> 00:07:12,410

as I can tell yes it was instead of

161

00:07:17,020 --> 00:07:15,170

feather the able to help him yes I think

162

00:07:19,840 --> 00:07:17,030

it was a her I think it was um it was

163

00:07:22,240 --> 00:07:19,850

Mars but look you know there's been lots

164

00:07:24,760 --> 00:07:22,250

of fun the controversy yes we've taken

165

00:07:27,490 --> 00:07:24,770

strong positions on pro nuclear power

166

00:07:30,370 --> 00:07:27,500

but anti-nuclear weapons we've been very

167

00:07:32,650 --> 00:07:30,380

strongly on climate change we get

168

00:07:35,350 --> 00:07:32,660

attacked a lot about climate change and

169

00:07:37,150 --> 00:07:35,360

some people object that we don't publish

170

00:07:39,490 --> 00:07:37,160

their letters well guess what we're not

171

00:07:41,920 --> 00:07:39,500

the ABC we're a private organization if

172

00:07:44,260 --> 00:07:41,930

your letters is ridiculous and you don't

173

00:07:45,820 --> 00:07:44,270

get the point and you refuse to use

174

00:07:48,400 --> 00:07:45,830

facts in your argument you don't get

175

00:07:49,930 --> 00:07:48,410

published vaccination we've run strong

176

00:07:51,909 --> 00:07:49,940

stories and I vaccination and we're

177

00:07:54,220 --> 00:07:51,919

attack in fact we'll try it where they

178

00:07:57,200 --> 00:07:54,230

try to take us to the Press Council over

179

00:07:59,510 --> 00:07:57,210

the issue and failed

180

00:08:01,820 --> 00:07:59,520

and yeah we've been very very more than

181

00:08:04,309 --> 00:08:01,830

one line that it's continuously we've

182

00:08:06,010 --> 00:08:04,319

continuously run is that we are pro

183

00:08:08,390 --> 00:08:06,020

science to the exclusion of all else

184

00:08:09,650 --> 00:08:08,400

Wilson what's the most satisfying thing

185

00:08:11,659 --> 00:08:09,660

and most of us will never experience

186

00:08:12,920 --> 00:08:11,669

this being a publisher of a magazine

187

00:08:15,980 --> 00:08:12,930

what's the thing that is really

188

00:08:19,460 --> 00:08:15,990

satisfying about that there are many

189

00:08:22,550 --> 00:08:19,470

many things getting letters from kids in

190

00:08:24,559 --> 00:08:22,560

their teens who say that they've decided

191

00:08:28,520 --> 00:08:24,569

to do science because of you that that

192

00:08:30,710 --> 00:08:28,530

is moving to get a birthday card on the

193

00:08:32,600 --> 00:08:30,720

7th anniversary chose a year ago from a

194

00:08:34,699 --> 00:08:32,610

subscriber who says I have just loved

195

00:08:37,430 --> 00:08:34,709

your magazine so very much I thought it

196

00:08:39,440 --> 00:08:37,440

was important for me to send your birth

197

00:08:40,850 --> 00:08:39,450

eka not lovely little moments like that

198

00:08:42,800 --> 00:08:40,860

talking to subscribers when you're there

199

00:08:44,810 --> 00:08:42,810

at light at night editing something and

200

00:08:47,360 --> 00:08:44,820

you take a call and subscriber and how

201  
00:08:49,820 --> 00:08:47,370  
how they tell you how much it means to

202  
00:08:52,040 --> 00:08:49,830  
them that sort of stuff you can't buy

203  
00:08:55,190 --> 00:08:52,050  
that sort of stuff that's real it's um

204  
00:08:59,870 --> 00:08:55,200  
it's it's it just comes from the heart

205  
00:09:01,940 --> 00:08:59,880  
and I I will walk away knowing that we

206  
00:09:03,440 --> 00:09:01,950  
did this we've we've you know one of the

207  
00:09:05,090 --> 00:09:03,450  
things you hope in life is that you have

208  
00:09:07,910 --> 00:09:05,100  
an impact and I think we've had an

209  
00:09:09,470 --> 00:09:07,920  
impact you get these you know for

210  
00:09:11,569 --> 00:09:09,480  
example we have a section which began

211  
00:09:14,180 --> 00:09:11,579  
about five years ago called wearing the

212  
00:09:16,730 --> 00:09:14,190  
cosmos it's a section where we published

213  
00:09:19,519 --> 00:09:16,740

pictures of people in weird bizarre

214

00:09:22,550 --> 00:09:19,529

places holding up copies of cosmos that

215

00:09:24,260 --> 00:09:22,560

they're reading we didn't start that we

216

00:09:25,490 --> 00:09:24,270

just started sending us that and then we

217

00:09:26,870 --> 00:09:25,500

thought well let's start publishing it

218

00:09:28,460 --> 00:09:26,880

and of course as soon as we published it

219

00:09:31,340 --> 00:09:28,470

more and more and more that's a regular

220

00:09:34,340 --> 00:09:31,350

section that shows the kind of love that

221

00:09:36,230 --> 00:09:34,350

people have for the magazine and I kind

222

00:09:37,340 --> 00:09:36,240

of you kind of wonder why is it I mean

223

00:09:40,280 --> 00:09:37,350

it's just a science magazine but it's

224

00:09:42,650 --> 00:09:40,290

not though we we do we are literally in

225

00:09:44,180 --> 00:09:42,660

our approach but we also take the piss

226

00:09:46,010 --> 00:09:44,190

out of ourselves we also you know have a

227

00:09:48,319 --> 00:09:46,020

bit of a laugh and I think people get

228

00:09:50,329 --> 00:09:48,329

that sort of literary high-minded yet

229

00:09:52,100 --> 00:09:50,339

able to laugh at ourselves I think they

230

00:09:54,410 --> 00:09:52,110

they really get that so that's cool

231

00:09:55,610 --> 00:09:54,420

that's probably the best Wilson what do

232

00:09:56,810 --> 00:09:55,620

you think you'd like to go into you want

233

00:09:58,880 --> 00:09:56,820

to do more publishing you want to

234

00:10:00,050 --> 00:09:58,890

continue in the science field as I said

235

00:10:01,579 --> 00:10:00,060

since everything's moving to melbourne

236

00:10:03,319 --> 00:10:01,589

there would you there's a lot of gaps in

237

00:10:03,639 --> 00:10:03,329

the Australian magazine market and the

238

00:10:05,889 --> 00:10:03,649

whole

239

00:10:07,239 --> 00:10:05,899

industry is in turmoil at the moment is

240

00:10:08,859 --> 00:10:07,249

it a time to go and try and start

241

00:10:11,499 --> 00:10:08,869

something was the time to sit back and

242

00:10:15,309 --> 00:10:11,509

just see what happens I've just had a

243

00:10:17,410 --> 00:10:15,319

little girl and a twix egg weeks old so

244

00:10:18,340 --> 00:10:17,420

I'm not keen to rush into anything I

245

00:10:21,669 --> 00:10:18,350

certainly don't want to start a business

246

00:10:24,129 --> 00:10:21,679

I'm probably going to sit back and

247

00:10:26,949 --> 00:10:24,139

either getting back into films or maybe

248

00:10:28,239 --> 00:10:26,959

write some books I mean complaining

249

00:10:30,160 --> 00:10:28,249

about not having the time to write a

250

00:10:32,290 --> 00:10:30,170

book for ages well now I'm going to have

251  
00:10:33,699 --> 00:10:32,300  
some time as you look around the

252  
00:10:35,319 --> 00:10:33,709  
Australian publishing industry is there

253  
00:10:36,970 --> 00:10:35,329  
is there any comment you'd like to make

254  
00:10:38,319 --> 00:10:36,980  
on it is is there any obvious mistakes

255  
00:10:39,429 --> 00:10:38,329  
that they're making it that they can't

256  
00:10:42,009 --> 00:10:39,439  
see they're running into a brick wall

257  
00:10:45,009 --> 00:10:42,019  
it's not it's not just the publishers

258  
00:10:47,350 --> 00:10:45,019  
false you know it's the market is

259  
00:10:48,629 --> 00:10:47,360  
changing so dramatically there are three

260  
00:10:50,919 --> 00:10:48,639  
things happening at the same time

261  
00:10:52,509 --> 00:10:50,929  
advertising is disappearing one of the

262  
00:10:54,730 --> 00:10:52,519  
things that we people relied on so much

263  
00:10:55,989 --> 00:10:54,740

is disappearing into areas that where

264

00:11:01,299 --> 00:10:55,999

once they might have got a hundred

265

00:11:02,769 --> 00:11:01,309

dollars per pair of eyes or but now

266

00:11:04,960 --> 00:11:02,779

they're getting like one-tenth of one

267

00:11:08,169 --> 00:11:04,970

cent because everything is moving online

268

00:11:11,470 --> 00:11:08,179

so the model the financial model on

269

00:11:13,569 --> 00:11:11,480

advertising side is changing the at the

270

00:11:15,579 --> 00:11:13,579

same time that the platforms are coming

271

00:11:17,079 --> 00:11:15,589

in that people have to deploy content

272

00:11:19,689 --> 00:11:17,089

not just in print which is one platform

273

00:11:21,160 --> 00:11:19,699

but a number of platforms and even

274

00:11:23,769 --> 00:11:21,170

within the Android platform you have

275

00:11:25,480 --> 00:11:23,779

five different flavors so theoretically

276

00:11:27,100 --> 00:11:25,490

you should have to republish your

277

00:11:30,069 --> 00:11:27,110

material and redesign it five different

278

00:11:33,160 --> 00:11:30,079

times just for Android you know ipad at

279

00:11:35,980 --> 00:11:33,170

least it's one these are so there are

280

00:11:39,309 --> 00:11:35,990

tectonic shifts happening in publishing

281

00:11:41,530 --> 00:11:39,319

that hack actually make it very very

282

00:11:43,030 --> 00:11:41,540

hard to invest your money in that area

283

00:11:44,739 --> 00:11:43,040

and know that you're gonna get a return

284

00:11:46,299 --> 00:11:44,749

so it's not just a case that publishers

285

00:11:47,410 --> 00:11:46,309

are making the wrong decision what is

286

00:11:49,360 --> 00:11:47,420

happening is if you make the wrong

287

00:11:51,610 --> 00:11:49,370

decisions publisher your margin of error

288

00:11:54,039 --> 00:11:51,620

is so thin now because a advertising

289

00:11:56,079 --> 00:11:54,049

disappearing and there's these you know

290

00:11:57,910 --> 00:11:56,089

tsunamis of technological change coming

291

00:11:58,530 --> 00:11:57,920

and people don't know how they're going

292

00:12:00,990 --> 00:11:58,540

to

293

00:12:02,700 --> 00:12:01,000

but look my suspicion is it's actually a

294

00:12:05,790 --> 00:12:02,710

really good time to invest in publishing

295

00:12:07,740 --> 00:12:05,800

I think that the technology is going to

296

00:12:09,660 --> 00:12:07,750

provide us more opportunity to figure

297

00:12:12,330 --> 00:12:09,670

out how to get to people with engaging

298

00:12:14,430 --> 00:12:12,340

content it's just that until we figure

299

00:12:17,190 --> 00:12:14,440

out the models are pay it's going to be

300

00:12:18,510 --> 00:12:17,200

a bit you know bit tense and what do you

301  
00:12:24,930 --> 00:12:18,520  
think of the standard of science

302  
00:12:26,340 --> 00:12:24,940  
journalism in Australia I like I like it

303  
00:12:30,540 --> 00:12:26,350  
when people laugh at the beginning of an

304  
00:12:33,180 --> 00:12:30,550  
answer it is patchy there are some

305  
00:12:35,610 --> 00:12:33,190  
places where it is excellent and there

306  
00:12:39,270 --> 00:12:35,620  
are places where it is perfunctory if it

307  
00:12:40,800 --> 00:12:39,280  
exists at all i think that the kind of

308  
00:12:42,390 --> 00:12:40,810  
professionalism that we see in science

309  
00:12:45,180 --> 00:12:42,400  
journalism in the united states and

310  
00:12:47,280 --> 00:12:45,190  
canada we don't see much of it here in

311  
00:12:49,050 --> 00:12:47,290  
fact i've written about this in the

312  
00:12:52,890 --> 00:12:49,060  
walkley magazine for journalists about

313  
00:12:55,890 --> 00:12:52,900

how bad it can get in australia i mean i

314

00:12:57,360 --> 00:12:55,900

remember when i told a friend that I was

315

00:12:59,100 --> 00:12:57,370

leaving I used to work at what is a

316

00:13:02,190 --> 00:12:59,110

foreign correspondent and I was reading

317

00:13:04,710 --> 00:13:02,200

the press gallery in Canberra to go and

318

00:13:06,030 --> 00:13:04,720

work in a science magazine he said why

319

00:13:07,860 --> 00:13:06,040

would you piss your career down the

320

00:13:10,620 --> 00:13:07,870

toilet like that and that was the

321

00:13:12,090 --> 00:13:10,630

attitude and tool in many many places

322

00:13:14,250 --> 00:13:12,100

still the attitude among us journalist

323

00:13:15,960 --> 00:13:14,260

it isn't respected science journalism

324

00:13:18,030 --> 00:13:15,970

and I think until we have respect for

325

00:13:19,770 --> 00:13:18,040

science journalism instead of something

326

00:13:20,850 --> 00:13:19,780

like political reporting or financial

327

00:13:22,680 --> 00:13:20,860

reporting so we have a respect for

328

00:13:23,910 --> 00:13:22,690

science or even sports reporting sport

329

00:13:25,650 --> 00:13:23,920

the sports reporting gets all this

330

00:13:27,840 --> 00:13:25,660

respect for something that in the end

331

00:13:30,450 --> 00:13:27,850

doesn't really matter it really doesn't

332

00:13:31,770 --> 00:13:30,460

I get this in a newspaper you have the

333

00:13:33,240 --> 00:13:31,780

soccer writer and you have the rugby

334

00:13:34,770 --> 00:13:33,250

writer and you have even the union

335

00:13:36,690 --> 00:13:34,780

writer and you have the where's the

336

00:13:38,760 --> 00:13:36,700

geology rider exactly anything in

337

00:13:41,400 --> 00:13:38,770

science you're supposed to be one person

338

00:13:44,730 --> 00:13:41,410

usually who has to cover all the

339

00:13:46,200 --> 00:13:44,740

sciences genetics to cosmology and oh by

340

00:13:48,810 --> 00:13:46,210

the way if nothing's happening a science

341

00:13:50,460 --> 00:13:48,820

can you help out with something else all

342

00:13:52,380 --> 00:13:50,470

right so yeah so--but you think there is

343

00:13:53,640 --> 00:13:52,390

hope we've got to end on a hopeful note

344

00:13:55,310 --> 00:13:53,650

here there is hope I think there is

345

00:13:56,600 --> 00:13:55,320

actually hope this is a really good time

346

00:13:58,639 --> 00:13:56,610

if

347

00:13:59,930 --> 00:13:58,649

the technology is making it possible for

348

00:14:01,990 --> 00:13:59,940

us to reach people in a way that

349

00:14:04,190 --> 00:14:02,000

previously you couldn't you just gotta

350

00:14:05,750 --> 00:14:04,200

publishers have got to just hang on and

351

00:14:08,900 --> 00:14:05,760

stick the quality the one thing about

352

00:14:11,240 --> 00:14:08,910

the digital revolution that seems to be

353

00:14:13,819 --> 00:14:11,250

holding true is that if you were doing

354

00:14:16,040 --> 00:14:13,829

really crappy stuff you you won't last

355

00:14:17,480 --> 00:14:16,050

now because it's there's so much stuff

356

00:14:20,240 --> 00:14:17,490

around that people are gravitating

357

00:14:21,500 --> 00:14:20,250

towards good what you know that by good

358

00:14:23,240 --> 00:14:21,510

I mean it could be you might be doing

359

00:14:25,550 --> 00:14:23,250

celebrity stuff but is it good that's

360

00:14:28,460 --> 00:14:25,560

are you good at celebrity so I only I

361

00:14:29,810 --> 00:14:28,470

think only a few publishers will be

362

00:14:31,970 --> 00:14:29,820

state left standing at the end of it

363

00:14:33,710 --> 00:14:31,980

those that produce quality stuff so why

364

00:14:36,829 --> 00:14:33,720

not start your business producing

365

00:14:38,170 --> 00:14:36,839

quality it's worked for us mmm now

366

00:14:40,519 --> 00:14:38,180

there's a number of riders out there

367

00:14:41,990 --> 00:14:40,529

that you work in the celebrity field in

368

00:14:43,940 --> 00:14:42,000

the news field that get a lot of

369

00:14:45,920 --> 00:14:43,950

attraction to their name and their blogs

370

00:14:47,569 --> 00:14:45,930

by creating controversy there's that

371

00:14:49,310 --> 00:14:47,579

necessarily work in science or do people

372

00:14:52,699 --> 00:14:49,320

not respect you if you do that no I

373

00:14:54,740 --> 00:14:52,709

don't respect you controversy where it's

374

00:14:57,710 --> 00:14:54,750

based on science is okay so we ran a

375

00:14:59,389 --> 00:14:57,720

piece on a cover story on mass delusions

376

00:15:02,000 --> 00:14:59,399

which was basically about why people

377

00:15:03,800 --> 00:15:02,010

believe in crazy stuff and that did

378

00:15:05,660 --> 00:15:03,810

really really well what was funny for me

379

00:15:09,350 --> 00:15:05,670

was that the people who believe in crazy

380

00:15:11,269 --> 00:15:09,360

stuff bullet to they work at this fire

381

00:15:14,449 --> 00:15:11,279

they get a double dip yeah yeah double

382

00:15:16,220 --> 00:15:14,459

dip so that was intriguing but yeah we

383

00:15:17,509 --> 00:15:16,230

were we were really rubbing their noses

384

00:15:18,590 --> 00:15:17,519

in it but yet they bought it and they

385

00:15:21,199 --> 00:15:18,600

wanted to write to us and saying hello

386

00:15:23,230 --> 00:15:21,209

it's not quite as you say um but not as

387

00:15:25,280 --> 00:15:23,240

you know sir chasing controlscontrol

388

00:15:27,860 --> 00:15:25,290

controversy for its own sake never

389

00:15:29,990 --> 00:15:27,870

achieves anything if for example when we

390

00:15:32,720 --> 00:15:30,000

did a cover story on thorium reactors

391

00:15:34,819 --> 00:15:32,730

which are a new potential nuclear I'm

392

00:15:36,199 --> 00:15:34,829

bit of a fan of that I'm of the the

393

00:15:38,509 --> 00:15:36,209

Indians and the Indonesians could

394

00:15:40,069 --> 00:15:38,519

actually beat us to this exactly so the

395

00:15:41,630 --> 00:15:40,079

particular type of thorium were talking

396

00:15:44,180 --> 00:15:41,640

about it accelerated Rivlin subcritical

397

00:15:45,410 --> 00:15:44,190

nuclear reactors these ones bernal

398

00:15:47,540 --> 00:15:45,420

nuclear waste is part of the process

399

00:15:49,600 --> 00:15:47,550

this is really exciting and we went

400

00:15:51,800 --> 00:15:49,610

really really hard saying things like

401  
00:15:53,329 --> 00:15:51,810  
coal-fired power stations need to be

402  
00:15:55,189 --> 00:15:53,339  
shut down we should not build another

403  
00:15:57,560 --> 00:15:55,199  
coal-fired power station in Australia

404  
00:15:59,810 --> 00:15:57,570  
all the world there's another 500 plan

405  
00:16:01,550 --> 00:15:59,820  
to be built in China in the next 15

406  
00:16:03,620 --> 00:16:01,560  
years and we said when you have

407  
00:16:05,490 --> 00:16:03,630  
technology like this which burns all

408  
00:16:07,230 --> 00:16:05,500  
nuclear waste and generates power

409  
00:16:09,090 --> 00:16:07,240  
why on earth would you create another

410  
00:16:10,920 --> 00:16:09,100  
coal-fired power station when you know

411  
00:16:14,130 --> 00:16:10,930  
that the people who live near qualified

412  
00:16:16,500 --> 00:16:14,140  
power stations have high death rates

413  
00:16:18,570 --> 00:16:16,510

higher rates of cancer are exposed to

414

00:16:20,850 --> 00:16:18,580

more radiation because of the coal ash

415

00:16:23,550 --> 00:16:20,860

flying off and guess what they kill

416

00:16:25,110 --> 00:16:23,560

26,000 people a year by putting by the

417

00:16:26,640 --> 00:16:25,120

admitting that stuff like that gun kelly

418

00:16:28,050 --> 00:16:26,650

into the atmosphere and I asked

419

00:16:29,700 --> 00:16:28,060

breathing it in and having heart attacks

420

00:16:32,490 --> 00:16:29,710

earlier than we were otherwise might

421

00:16:36,240 --> 00:16:32,500

have well and I bet you got mail about

422

00:16:38,550 --> 00:16:36,250

that oh yeah we got a lot of mail well

423

00:16:40,050 --> 00:16:38,560

are you actually on radio once somebody

424

00:16:42,000 --> 00:16:40,060

said are you seriously saying we should

425

00:16:44,670 --> 00:16:42,010

shut down coal-fired power stations was

426

00:16:46,470 --> 00:16:44,680

a commercial radio station I said yes I

427

00:16:48,300 --> 00:16:46,480

need know how to react to that because

428

00:16:52,470 --> 00:16:48,310

he expect me saying well no of course oh

429

00:16:53,700 --> 00:16:52,480

no no no yes shut them all down now well

430

00:16:55,980 --> 00:16:53,710

I hope you don't get as much controversy

431

00:16:57,690 --> 00:16:55,990

just with an eight-year-old kid no

432

00:17:00,060 --> 00:16:57,700

absolutely not okay well look thank you

433

00:17:01,440 --> 00:17:00,070

enjoy your quiet life for a while anyway

434

00:17:15,679 --> 00:17:01,450

thanks very much you wait to live a

435

00:17:20,309 --> 00:17:18,270

hi there this is ben Radford from

436

00:17:22,980 --> 00:17:20,319

skeptical inquirer magazine the monster

437

00:17:24,870 --> 00:17:22,990

talk podcast Discovery News skeptical

438

00:17:26,010 --> 00:17:24,880

countries is and elsewhere you may also

439

00:17:27,809 --> 00:17:26,020

know me as the guy that's all the

440

00:17:29,070 --> 00:17:27,819

chupacabra mystery I want to let you

441

00:17:31,620 --> 00:17:29,080

know about a cool new board game I

442

00:17:33,960 --> 00:17:31,630

created cult undead apocalypse war the

443

00:17:36,120 --> 00:17:33,970

Damned undead apocalypse has vampires

444

00:17:37,980 --> 00:17:36,130

and werewolves and zombies all battling

445

00:17:39,840 --> 00:17:37,990

it out in a post-apocalyptic world with

446

00:17:42,120 --> 00:17:39,850

humans so it's sort of like Mad Max

447

00:17:43,830 --> 00:17:42,130

meets the walking dead so if you're

448

00:17:46,170 --> 00:17:43,840

interested in zombies and werewolves and

449

00:17:48,480 --> 00:17:46,180

vampires or board games of any kind or

450

00:17:51,360 --> 00:17:48,490

my work please check it out thanks i

451  
00:17:53,340 --> 00:17:51,370  
appreciate undead apocalypse the

452  
00:17:57,000 --> 00:17:53,350  
fast-paced board game where you control

453  
00:18:00,090 --> 00:17:57,010  
armies of zombies vampires werewolves

454  
00:18:03,060 --> 00:18:00,100  
and humans in Earth's final war of the

455  
00:18:06,120 --> 00:18:03,070  
damned learn more at undead board game

456  
00:18:17,640 --> 00:18:06,130  
com or support us on kickstarter com

457  
00:18:20,610 --> 00:18:17,650  
before july eighth welcome to awaken

458  
00:18:24,180 --> 00:18:20,620  
science from our iOS this week new mega

459  
00:18:30,960 --> 00:18:24,190  
data storage baby IQ and infectious

460  
00:18:37,240 --> 00:18:34,540  
we may soon have petabytes size storage

461  
00:18:42,010 --> 00:18:37,250  
disks the equivalent of ten point six

462  
00:18:44,200 --> 00:18:42,020  
years of HDTV until now storage disks

463  
00:18:46,600 --> 00:18:44,210

have been limited by how small the point

464

00:18:48,910 --> 00:18:46,610

of a light beam could be preventing

465

00:18:51,490 --> 00:18:48,920

disks from being written at a nanometer

466

00:18:53,160 --> 00:18:51,500

scale but now a new technique can

467

00:18:56,500 --> 00:18:53,170

produce a light spot that is one

468

00:18:58,660 --> 00:18:56,510

ten-thousandth of a human hair wide this

469

00:19:00,580 --> 00:18:58,670

technology allows more data to be

470

00:19:03,130 --> 00:19:00,590

written onto disks with incredible

471

00:19:07,060 --> 00:19:03,140

accuracy and could lead to huge amounts

472

00:19:08,770 --> 00:19:07,070

of storage on a single disk a new

473

00:19:12,010 --> 00:19:08,780

procedure may increase the safety of

474

00:19:13,720 --> 00:19:12,020

therapies using stem cells when stem

475

00:19:16,960 --> 00:19:13,730

cells are converted to other cell types

476  
00:19:19,750 --> 00:19:16,970  
for therapy some may take on a form that

477  
00:19:22,300 --> 00:19:19,760  
can produce tumors the new procedure

478  
00:19:24,340 --> 00:19:22,310  
identifies these aberrant cells and

479  
00:19:27,190 --> 00:19:24,350  
removes them using antibodies or

480  
00:19:28,960 --> 00:19:27,200  
bacterial toxins application of this

481  
00:19:31,630 --> 00:19:28,970  
technique has been shown to prevent the

482  
00:19:33,940 --> 00:19:31,640  
development of tumors in mice you're

483  
00:19:37,240 --> 00:19:33,950  
listening to a week in science from our

484  
00:19:39,880 --> 00:19:37,250  
iOS and now for size headlines in 30

485  
00:19:42,880 --> 00:19:39,890  
seconds visual cues from your homeland

486  
00:19:44,470 --> 00:19:42,890  
such as faces or cultural images make it

487  
00:19:47,200 --> 00:19:44,480  
more difficult to speak a second

488  
00:19:49,060 --> 00:19:47,210

language weight gain an increase in head

489

00:19:51,420 --> 00:19:49,070

size in the first month of life is

490

00:19:53,590 --> 00:19:51,430

linked to IQ at early school age

491

00:19:56,440 --> 00:19:53,600

pesticide levels which are considered to

492

00:19:58,660 --> 00:19:56,450

be environmentally safe still reduce

493

00:20:01,090 --> 00:19:58,670

aquatic invertebrates biodiversity by

494

00:20:03,010 --> 00:20:01,100

thirty percent and a technique for

495

00:20:04,920 --> 00:20:03,020

producing high-quality holographic

496

00:20:08,610 --> 00:20:04,930

displays is a step towards

497

00:20:10,960 --> 00:20:08,620

three-dimensional TVs without glasses

498

00:20:13,350 --> 00:20:10,970

Swedish researchers have found that

499

00:20:15,670 --> 00:20:13,360

applause spreads like a disease

500

00:20:18,130 --> 00:20:15,680

individuals in an audience pick up the

501  
00:20:20,530 --> 00:20:18,140  
clapping infection by hearing the volume

502  
00:20:22,780 --> 00:20:20,540  
of applause rather than directly seeing

503  
00:20:24,880 --> 00:20:22,790  
their neighbors clapping the clapping

504  
00:20:26,620 --> 00:20:24,890  
infection will spread until at least one

505  
00:20:28,480 --> 00:20:26,630  
individual decides that they have

506  
00:20:30,610 --> 00:20:28,490  
clapped for long enough these

507  
00:20:32,680 --> 00:20:30,620  
characteristics of applause mean that

508  
00:20:35,080 --> 00:20:32,690  
there is no correlation between the

509  
00:20:40,049 --> 00:20:35,090  
duration of applause and the quality of

510  
00:20:44,649 --> 00:20:42,430  
don't forget science behind the

511  
00:20:47,200 --> 00:20:44,659  
headlines this Tuesday where we'll be

512  
00:20:49,480 --> 00:20:47,210  
investigating personal genetic profiling

513  
00:20:51,850 --> 00:20:49,490

will be live streaming the event so you

514

00:20:53,680 --> 00:20:51,860

can watch from wherever you may be or

515

00:20:57,580 --> 00:20:53,690

join us at the science exchange in

516

00:21:00,909 --> 00:20:57,590

Adelaide on jun 25 details at our iOS

517

00:21:03,220 --> 00:21:00,919

org dot a you that's been the highlights

518

00:21:05,409 --> 00:21:03,230

of another big week in science for more

519

00:21:09,610 --> 00:21:05,419

information and other science news check

520

00:21:12,789 --> 00:21:09,620

out the are isles website RI a u.s. dot

521

00:21:15,789 --> 00:21:12,799

org a you where you can also sign up for

522

00:21:17,680 --> 00:21:15,799

notifications of future episodes you can

523

00:21:21,519 --> 00:21:17,690

follow a week in science on twitter

524

00:21:24,010 --> 00:21:21,529

using the hashtag weekend sigh i'm paul

525

00:21:38,740 --> 00:21:24,020

willis and on behalf of the Arias team

526

00:21:41,620 --> 00:21:38,750

see you next week greetings skeptics

527

00:21:45,039 --> 00:21:41,630

them mrs. do you know what to do in

528

00:21:48,580 --> 00:21:45,049

August come to Stockholm Sweden and meet

529

00:21:52,720 --> 00:21:48,590

astronaut a special assignment activist

530

00:21:55,990 --> 00:21:52,730

hey Lee Stevens stats guru upon screams

531

00:21:59,230 --> 00:21:56,000

linsley undercover health journalist an

532

00:22:03,010 --> 00:21:59,240

abysses p and many more at the 15th

533

00:22:05,710 --> 00:22:03,020

european skeptics Congress friday the

534

00:22:09,340 --> 00:22:05,720

twenty-third to sunday the 25th of

535

00:22:13,510 --> 00:22:09,350

august in stockholm sweden what a 15th

536

00:22:16,740 --> 00:22:13,520

european skeptics carcass www wo

537

00:22:16,750 --> 00:22:33,620

www euro skeptics gone dot org

538

00:22:38,630 --> 00:22:35,930

one of the hazards of being a skeptic

539

00:22:39,980 --> 00:22:38,640

about paranormal subjects is that those

540

00:22:42,230 --> 00:22:39,990

who have had their own personal

541

00:22:45,220 --> 00:22:42,240

experiences or investigated a peculiar

542

00:22:48,320 --> 00:22:45,230

case like to play stumped the skeptic oh

543

00:22:51,440 --> 00:22:48,330

you are a skeptic well I have a story

544

00:22:53,270 --> 00:22:51,450

for you and then I get an earful how do

545

00:22:55,490 --> 00:22:53,280

you explain that they conclude with

546

00:22:58,610 --> 00:22:55,500

added self satisfaction of a story well

547

00:23:01,910 --> 00:22:58,620

told I can't and I'm not going to try to

548

00:23:04,550 --> 00:23:01,920

explain it unless it's a well-researched

549

00:23:07,400 --> 00:23:04,560

case which has published documentation I

550

00:23:10,430 --> 00:23:07,410

can't say anything about it it's just a

551

00:23:13,010 --> 00:23:10,440

story if I accept it every story I heard

552

00:23:15,080 --> 00:23:13,020

at face value every day I'd be broken in

553

00:23:18,110 --> 00:23:15,090

a mess of trouble I'm not accusing

554

00:23:21,050 --> 00:23:18,120

people of lying I'm saying I wasn't

555

00:23:22,550 --> 00:23:21,060

there it was not my experience so I'm

556

00:23:25,250 --> 00:23:22,560

not going to speculate about what you

557

00:23:26,990 --> 00:23:25,260

saw or what may have happened there is

558

00:23:29,810 --> 00:23:27,000

nothing to go on when cornered with

559

00:23:32,600 --> 00:23:29,820

these stories I can't fact check or

560

00:23:34,820 --> 00:23:32,610

confirm I can't pull an explanation out

561

00:23:38,180 --> 00:23:34,830

of a hat I have no place to go with them

562

00:23:40,100 --> 00:23:38,190

except to say interesting paranormal

563

00:23:42,590 --> 00:23:40,110

books are primarily these types of

564

00:23:44,450 --> 00:23:42,600

stories it's unusual for a case to be

565

00:23:46,460 --> 00:23:44,460

well investigated compared to the

566

00:23:48,140 --> 00:23:46,470

thousands of stories that are related

567

00:23:50,510 --> 00:23:48,150

from witnesses or references from other

568

00:23:53,060 --> 00:23:50,520

sources too many stories aren't

569

00:23:55,160 --> 00:23:53,070

referenced at all I was recently reading

570

00:23:57,650 --> 00:23:55,170

a book on local monsters and some

571

00:23:59,540 --> 00:23:57,660

accounts lacked accurate locations there

572

00:24:02,720 --> 00:23:59,550

was no town of that name or there were

573

00:24:04,400 --> 00:24:02,730

no details useless that is such poor

574

00:24:07,070 --> 00:24:04,410

quality evidence it might as well be

575

00:24:10,130 --> 00:24:07,080

discarded this is more likely wrong than

576

00:24:12,140 --> 00:24:10,140

helpful anecdotes do not necessarily

577

00:24:15,170 --> 00:24:12,150

garner strength in numbers not for

578

00:24:17,420 --> 00:24:15,180

paranormal subjects a pile of unreliable

579

00:24:20,270 --> 00:24:17,430

tales is no better than one unreliable

580

00:24:22,550 --> 00:24:20,280

tale it's all hollow when it comes to

581

00:24:25,190 --> 00:24:22,560

local ghost and monster tales the

582

00:24:27,560 --> 00:24:25,200

stories just exist and it is unclear

583

00:24:30,410 --> 00:24:27,570

where they originated such tales are

584

00:24:32,810 --> 00:24:30,420

great as local folklore a problem arises

585

00:24:35,600 --> 00:24:32,820

when these anecdotes are elevated to

586

00:24:37,280 --> 00:24:35,610

evidence there is an over-reliance on

587

00:24:40,460 --> 00:24:37,290

anecdotes in the paranormal community

588

00:24:43,700 --> 00:24:40,470

for hauntings cryptozoology and ufology

589

00:24:45,230 --> 00:24:43,710

as the basis of Investigation a case

590

00:24:47,480 --> 00:24:45,240

we'll start with an observation but if

591

00:24:50,240 --> 00:24:47,490

that is all that it is with no physical

592

00:24:52,430 --> 00:24:50,250

evidence no verification and a cold

593

00:24:55,340 --> 00:24:52,440

trail left to follow there is nothing

594

00:24:57,860 --> 00:24:55,350

you can do with it but document it had

595

00:25:00,980 --> 00:24:57,870

your own experience cherish it as your

596

00:25:03,380 --> 00:25:00,990

own I just can't help you and it's a bit

597

00:25:05,450 --> 00:25:03,390

rude to put me on the spot you had the

598

00:25:07,760 --> 00:25:05,460

experience it's up to you to provide

599

00:25:18,530 --> 00:25:07,770

evidence to support it not for me to

600

00:25:23,370 --> 00:25:21,120

did you see that UFO sighting that made

601  
00:25:25,080 --> 00:25:23,380  
the news what did that latest study

602  
00:25:27,510 --> 00:25:25,090  
about alternative treatments really say

603  
00:25:30,480 --> 00:25:27,520  
is this photo making the rounds real or

604  
00:25:32,340 --> 00:25:30,490  
hoax doubtful news is a unique website

605  
00:25:34,500 --> 00:25:32,350  
featuring news about pseudoscience the

606  
00:25:36,200 --> 00:25:34,510  
paranormal anomalies and questionable

607  
00:25:39,450 --> 00:25:36,210  
claims framed with the skeptical view

608  
00:25:41,910 --> 00:25:39,460  
come visit doleful newscom every day for

609  
00:25:45,060 --> 00:25:41,920  
news about cryptozoology conspiracies

610  
00:25:47,550 --> 00:25:45,070  
shams scams and more follow us on

611  
00:25:49,110 --> 00:25:47,560  
twitter at doubtful news critical

612  
00:25:51,390 --> 00:25:49,120  
thinking is essential in assessing

613  
00:25:58,160 --> 00:25:51,400

today's news duffel news helps you

614

00:26:01,950 --> 00:26:00,030

have you heard the one about how the

615

00:26:03,480 --> 00:26:01,960

illuminati in conjunction with the US

616

00:26:05,370 --> 00:26:03,490

government are hiding the existence of

617

00:26:07,560 --> 00:26:05,380

aliens in order to ensure the supply of

618

00:26:09,000 --> 00:26:07,570

helium is kept low although the CIA the

619

00:26:10,770 --> 00:26:09,010

militant wing of the Freemasons are

620

00:26:12,210 --> 00:26:10,780

working with the elders of zion to take

621

00:26:14,700 --> 00:26:12,220

control of the population of the world

622

00:26:16,500 --> 00:26:14,710

through fluoridated chemtrails canberra

623

00:26:17,970 --> 00:26:16,510

skeptics incorporated on behalf of the

624

00:26:19,680 --> 00:26:17,980

shadow government will be massing an

625

00:26:22,230 --> 00:26:19,690

array of dark forces for the australian

626  
00:26:23,970 --> 00:26:22,240  
skeptics national convention 2013 this

627  
00:26:25,650 --> 00:26:23,980  
convention has conspired to coincide

628  
00:26:27,900 --> 00:26:25,660  
with the 50th anniversary of the

629  
00:26:29,580 --> 00:26:27,910  
assassination of John F Kennedy possibly

630  
00:26:31,620 --> 00:26:29,590  
the most famous conspiracy theory of all

631  
00:26:33,450 --> 00:26:31,630  
time if you've ever wanted to learn

632  
00:26:35,400 --> 00:26:33,460  
about the truth behind the death of JFK

633  
00:26:37,290 --> 00:26:35,410  
what makes for a good conspiracy theory

634  
00:26:39,300 --> 00:26:37,300  
and why they are so prevalent Canberra

635  
00:26:41,040 --> 00:26:39,310  
skeptics invites you to attend that is

636  
00:26:44,040 --> 00:26:41,050  
of course should you choose to accept it

637  
00:26:46,620 --> 00:26:44,050  
come to national skeptics convention org

638  
00:26:50,930 --> 00:26:46,630

and just remember they will be watching

639

00:27:00,149 --> 00:26:54,299

now it's time for dr. Rachel reports

640

00:27:02,789 --> 00:27:00,159

with dr. Rachel Dunlop hello listeners

641

00:27:04,529 --> 00:27:02,799

and welcome to dr. Reggie reports well

642

00:27:07,500 --> 00:27:04,539

this week I'm talking to a real

643

00:27:09,659 --> 00:27:07,510

scientist actually dr. david hawks who

644

00:27:12,779 --> 00:27:09,669

is a medical virologist at the flory

645

00:27:14,909 --> 00:27:12,789

institute in melbourne australia has

646

00:27:18,360 --> 00:27:14,919

just published a paper on the HPV

647

00:27:20,549 --> 00:27:18,370

vaccine with two colleagues of mine as

648

00:27:22,470 --> 00:27:20,559

well in fact who are from the stop the

649

00:27:24,659 --> 00:27:22,480

Australian vaccination network facebook

650

00:27:26,789 --> 00:27:24,669

page or s avian and I've got David on

651  
00:27:30,149 --> 00:27:26,799  
the line now from Melbourne hi David

652  
00:27:34,019 --> 00:27:30,159  
thanks for joining us I Rachel welcome

653  
00:27:35,759 --> 00:27:34,029  
to the skeptic zone podcast Thanks now

654  
00:27:37,970 --> 00:27:35,769  
I'm this paper that you've published

655  
00:27:40,850 --> 00:27:37,980  
this week it is in the journal

656  
00:27:44,370 --> 00:27:40,860  
infectious agents in cancer it's

657  
00:27:48,120 --> 00:27:44,380  
answering a human papilloma vaccine

658  
00:27:50,519 --> 00:27:48,130  
concerns a matter of science and time so

659  
00:27:52,950 --> 00:27:50,529  
um I will go into a little bit of what

660  
00:27:54,690 --> 00:27:52,960  
you've covered in the paper in a moment

661  
00:27:57,240 --> 00:27:54,700  
it's a review paper of the evidence

662  
00:28:00,210 --> 00:27:57,250  
supporting that on the efficacy and a

663  
00:28:02,879 --> 00:28:00,220

safety of HPV vaccine but just as way of

664

00:28:06,120 --> 00:28:02,889

a bit of background let's talk about how

665

00:28:07,919 --> 00:28:06,130

this came about because this paper came

666

00:28:09,720 --> 00:28:07,929

about because you saw someone else had

667

00:28:12,240 --> 00:28:09,730

published something about HPV when she

668

00:28:13,740 --> 00:28:12,250

thought was wrong is that right yeah

669

00:28:15,570 --> 00:28:13,750

what happens it was actually in the same

670

00:28:17,159 --> 00:28:15,580

journal in the beginning of february

671

00:28:21,320 --> 00:28:17,169

there was a letter to the editor of

672

00:28:24,539 --> 00:28:21,330

written by some well-known anti-vaccine

673

00:28:27,930 --> 00:28:24,549

and i'll use the term loosely scientists

674

00:28:29,340 --> 00:28:27,940

and essentially it was it was a letter

675

00:28:30,870 --> 00:28:29,350

to the editor and i think the thing that

676

00:28:33,120 --> 00:28:30,880

sort of triggered it was it it was a

677

00:28:35,580 --> 00:28:33,130

journal that has an open review process

678

00:28:36,779 --> 00:28:35,590

so you can see the reviewers comments

679

00:28:39,419 --> 00:28:36,789

and things like that so I looked it up

680

00:28:42,539 --> 00:28:39,429

and I realized with about 15 minutes

681

00:28:44,669 --> 00:28:42,549

research that the article itself was

682

00:28:46,080 --> 00:28:44,679

just a bunch of you know recycled

683

00:28:48,870 --> 00:28:46,090

vaccine questions that have been

684

00:28:51,180 --> 00:28:48,880

answered but the one of the reviewers

685

00:28:53,490 --> 00:28:51,190

had nautical with one of the well with

686

00:28:55,470 --> 00:28:53,500

two of the the authors of this article

687

00:28:57,570 --> 00:28:55,480

three months beforehand and worked in

688

00:29:00,419 --> 00:28:57,580

the same Institute and in his comments

689

00:29:03,379 --> 00:29:00,429

he wrote awesome article fantastic I

690

00:29:07,039 --> 00:29:03,389

have no conflict of interest and that

691

00:29:09,889 --> 00:29:07,049

so it was yeah so that's what triggered

692

00:29:12,109 --> 00:29:09,899

a conversation with one of the editors

693

00:29:14,089 --> 00:29:12,119

in chief with the with the journal and

694

00:29:16,999 --> 00:29:14,099

originally we were going to put in a

695

00:29:19,579 --> 00:29:17,009

letter to the editor sort of sort of you

696

00:29:22,190 --> 00:29:19,589

know address these concerns and through

697

00:29:24,859 --> 00:29:22,200

a bunch of different reasons which I'm

698

00:29:28,099 --> 00:29:24,869

sort of in light of what's happened in

699

00:29:29,930 --> 00:29:28,109

the last week I think I wasn't quite as

700

00:29:31,579 --> 00:29:29,940

smart as I thought I was we managed to

701  
00:29:33,739 --> 00:29:31,589  
getting upgraded from a letter to the

702  
00:29:36,289 --> 00:29:33,749  
editor to an actual full review article

703  
00:29:37,639 --> 00:29:36,299  
yeah and tell me about the rat bags

704  
00:29:40,009 --> 00:29:37,649  
you've got on the paper with you because

705  
00:29:41,569 --> 00:29:40,019  
I happen to know them as well and you

706  
00:29:44,839 --> 00:29:41,579  
met them through social media is that

707  
00:29:47,209 --> 00:29:44,849  
correct yes I I've been a member of the

708  
00:29:50,599 --> 00:29:47,219  
well active on the stop the avian

709  
00:29:53,209 --> 00:29:50,609  
website since about 2009 and I went to I

710  
00:29:57,499 --> 00:29:53,219  
met up with them one of my co-authors

711  
00:29:59,839 --> 00:29:57,509  
Candace at a function beginning of last

712  
00:30:01,219 --> 00:29:59,849  
year we sort of hit it off and there was

713  
00:30:02,629 --> 00:30:01,229

always this discussion about i will

714

00:30:04,579 --> 00:30:02,639

write a paper together sometime an

715

00:30:07,629 --> 00:30:04,589

epidemiologist neurologist they can't be

716

00:30:10,099 --> 00:30:07,639

that many of them around and then we

717

00:30:13,459 --> 00:30:10,109

there was a guy called matt Berryman who

718

00:30:15,619 --> 00:30:13,469

is a data model in wollongong and in his

719

00:30:17,269 --> 00:30:15,629

past life is actually co authored an

720

00:30:19,039 --> 00:30:17,279

article on cancer so I was sort of

721

00:30:20,539 --> 00:30:19,049

you've got a virologist an

722

00:30:22,489 --> 00:30:20,549

epidemiologist in someone with a

723

00:30:24,619 --> 00:30:22,499

background in cancer so it just seemed

724

00:30:26,180 --> 00:30:24,629

like a really novel way to actually

725

00:30:27,799 --> 00:30:26,190

write an article and I guess that's the

726

00:30:30,109 --> 00:30:27,809

thing as I'm oh and early career

727

00:30:31,699 --> 00:30:30,119

researcher so it's a really competitive

728

00:30:34,549 --> 00:30:31,709

environment so if you can actually form

729

00:30:35,869 --> 00:30:34,559

collaborations with people through sort

730

00:30:37,789 --> 00:30:35,879

of social media we've got a shared

731

00:30:39,589 --> 00:30:37,799

interest this is sort of from an

732

00:30:41,629 --> 00:30:39,599

academic point of view it's really

733

00:30:43,999 --> 00:30:41,639

fascinating you know it's come out with

734

00:30:45,889 --> 00:30:44,009

what I think is a paper that we're quite

735

00:30:47,539 --> 00:30:45,899

proud of yeah I mean that the sort of

736

00:30:49,129 --> 00:30:47,549

serendipitous nature of the way this

737

00:30:51,349 --> 00:30:49,139

collaboration happened i think is really

738

00:30:52,849 --> 00:30:51,359

interesting and i guess it started

739

00:30:54,979 --> 00:30:52,859

because an anti-rattle said something

740

00:30:57,319 --> 00:30:54,989

wrong on the internet essentially and

741

00:30:58,579 --> 00:30:57,329

you guys decided to get together and do

742

00:31:00,589 --> 00:30:58,589

something about it and i think that

743

00:31:02,749 --> 00:31:00,599

you're right and this is a way that you

744

00:31:04,759 --> 00:31:02,759

know when you have academics that you

745

00:31:06,319 --> 00:31:04,769

work with say what's the use of Twitter

746

00:31:07,969 --> 00:31:06,329

or not to use of Facebook well this is a

747

00:31:09,889 --> 00:31:07,979

very good example of that isn't it

748

00:31:14,269 --> 00:31:09,899

absolutely and I mean the thing is you a

749

00:31:16,120 --> 00:31:14,279

lot of a lot I say much the stuff antav

750

00:31:17,860 --> 00:31:16,130

actors say is either wrong what

751

00:31:21,100 --> 00:31:17,870

he picked and the rest of it they don't

752

00:31:22,480 --> 00:31:21,110

actually say but it's it's never the

753

00:31:24,550 --> 00:31:22,490

conversations with the editor-in-chief

754

00:31:26,920 --> 00:31:24,560

are quite interesting because his take

755

00:31:29,170 --> 00:31:26,930

on was that is Italian and he says that

756

00:31:31,210 --> 00:31:29,180

a lot of the GPS he interacts with are a

757

00:31:33,010 --> 00:31:31,220

bit worried about the vaccine because in

758

00:31:36,070 --> 00:31:33,020

Australia was accepted really readily

759

00:31:37,750 --> 00:31:36,080

and it was an invention and so was never

760

00:31:38,920 --> 00:31:37,760

an issue but I mean I've spoken to

761

00:31:41,110 --> 00:31:38,930

people from Europe and there was always

762

00:31:43,630 --> 00:31:41,120

this all it's a bit new let's give it a

763

00:31:46,030 --> 00:31:43,640

few you know we're not exactly sure and

764

00:31:47,290 --> 00:31:46,040

people ask these questions would you

765

00:31:49,360 --> 00:31:47,300

know I've got in the paper and it was

766

00:31:50,920 --> 00:31:49,370

about let's write this article let's

767

00:31:53,500 --> 00:31:50,930

write it for an informed audience so

768

00:31:54,940 --> 00:31:53,510

it's not just purely a virology point of

769

00:31:58,000 --> 00:31:54,950

view and epidemiology is putting

770

00:32:00,520 --> 00:31:58,010

together in a format that we can give to

771

00:32:03,850 --> 00:32:00,530

a GP or someone with a bit of an

772

00:32:06,490 --> 00:32:03,860

informed view of the topic vaccine take

773

00:32:08,320 --> 00:32:06,500

TV cancel whichever way you want to go

774

00:32:09,790 --> 00:32:08,330

with it and then they can kind of go

775

00:32:11,770 --> 00:32:09,800

when someone asked them a question they

776

00:32:13,750 --> 00:32:11,780

can look at it and go more there's the

777

00:32:15,280 --> 00:32:13,760

answer they don't have to go and crawl

778

00:32:17,110 --> 00:32:15,290

through you know an academic review

779

00:32:18,730 --> 00:32:17,120

which probably looks at maybe a certain

780

00:32:21,100 --> 00:32:18,740

angle of it rather than sort of

781

00:32:22,690 --> 00:32:21,110

answering the questions that GPS in the

782

00:32:24,690 --> 00:32:22,700

general public are actually doing yeah

783

00:32:26,830 --> 00:32:24,700

so just on that issue then of

784

00:32:28,360 --> 00:32:26,840

anti-vaxxers and HPV what are some of

785

00:32:30,370 --> 00:32:28,370

the things that they have said about the

786

00:32:33,100 --> 00:32:30,380

HPV vaccine that's been as you say

787

00:32:34,920 --> 00:32:33,110

incorrect or wrong most that's the stuff

788

00:32:38,500 --> 00:32:34,930

they said is being correct or wrong but

789

00:32:40,240 --> 00:32:38,510

can you be specific yeah there's this

790

00:32:42,190 --> 00:32:40,250

sort of a couple of areas the first is

791

00:32:43,510 --> 00:32:42,200

there's a lot of fuss about how it got

792

00:32:45,190 --> 00:32:43,520

approved and things like that and to be

793

00:32:47,470 --> 00:32:45,200

honest with you I'm a scientist I don't

794

00:32:49,330 --> 00:32:47,480

you know if I start getting worried

795

00:32:51,310 --> 00:32:49,340

about how certain things are pushed

796

00:32:53,200 --> 00:32:51,320

through laws and regulations it's it's

797

00:32:54,850 --> 00:32:53,210

just confusing what I wanted to look at

798

00:32:56,890 --> 00:32:54,860

was the actual science so that and the

799

00:32:59,080 --> 00:32:56,900

questions generally are to do with the

800

00:33:00,490 --> 00:32:59,090

adverse events there's been heaps of

801  
00:33:01,960 --> 00:33:00,500  
stuff that and I think because it's the

802  
00:33:03,370 --> 00:33:01,970  
sexually transmitted disease in a

803  
00:33:05,590 --> 00:33:03,380  
sexually transmitted disease with a

804  
00:33:07,540 --> 00:33:05,600  
vaccine you give to 12 and 13 year old

805  
00:33:09,880 --> 00:33:07,550  
girls it's sort of hit into that sort of

806  
00:33:11,440 --> 00:33:09,890  
Christian Right fundamentalist that you

807  
00:33:13,510 --> 00:33:11,450  
know occurs in the States and that was

808  
00:33:16,120 --> 00:33:13,520  
probably exacerbated by a number of

809  
00:33:18,010 --> 00:33:16,130  
states making it compulsory so the

810  
00:33:20,200 --> 00:33:18,020  
questions are generally are you know it

811  
00:33:21,850 --> 00:33:20,210  
causes ms it kills people it's the big

812  
00:33:24,250 --> 00:33:21,860  
one it kills people it's got all these

813  
00:33:26,500 --> 00:33:24,260

bad adverse effects and I came across

814

00:33:29,950 --> 00:33:26,510

some fantastic really interesting data

815

00:33:32,649 --> 00:33:29,960

like in Australia we when we first had

816

00:33:35,289 --> 00:33:32,659

the the HPV vaccine we've had reports of

817

00:33:37,720 --> 00:33:35,299

I think in the first year about 750

818

00:33:40,000 --> 00:33:37,730

adverse reactions in the first couple of

819

00:33:41,919 --> 00:33:40,010

years they gave 1.9 million girls the

820

00:33:45,460 --> 00:33:41,929

dough so it's it's not that high the

821

00:33:47,590 --> 00:33:45,470

next year it was about 450 yeah probably

822

00:33:49,120 --> 00:33:47,600

a similar amount of people but what I

823

00:33:51,039 --> 00:33:49,130

found even more interesting was in

824

00:33:54,460 --> 00:33:51,049

Australia I think so if I get the

825

00:33:56,830 --> 00:33:54,470

numbers right it's about 23 adverse

826  
00:34:00,250 --> 00:33:56,840  
reactions 400,000 people death of Jack

827  
00:34:04,299 --> 00:34:00,260  
seen in the US it's about 56 it's

828  
00:34:06,580 --> 00:34:04,309  
exactly the same vaccine we're pretty

829  
00:34:09,669 --> 00:34:06,590  
homogeneous there's no sort of racial or

830  
00:34:11,619 --> 00:34:09,679  
genetic bias as purely on how people

831  
00:34:13,899 --> 00:34:11,629  
interpret or people will look for

832  
00:34:16,180 --> 00:34:13,909  
something to blame on the vaccine like

833  
00:34:19,839 --> 00:34:16,190  
there was a paper that looked at death's

834  
00:34:22,450 --> 00:34:19,849  
then there was 32 deaths reported and

835  
00:34:25,510 --> 00:34:22,460  
they found that 12 of them they couldn't

836  
00:34:27,430 --> 00:34:25,520  
find a person or a death so the the

837  
00:34:28,690 --> 00:34:27,440  
system in the US the Bears is open to

838  
00:34:30,849 --> 00:34:28,700

anyone anyone could write something down

839

00:34:32,260 --> 00:34:30,859

this you can have a lot of fun and

840

00:34:34,060 --> 00:34:32,270

create some quite humorous adverse

841

00:34:36,820 --> 00:34:34,070

events if you're that way inclined but

842

00:34:38,399 --> 00:34:36,830

it also doesn't filter and then they say

843

00:34:41,530 --> 00:34:38,409

quite blatantly that this is just

844

00:34:42,879 --> 00:34:41,540

mass-produced you know reporting and

845

00:34:45,490 --> 00:34:42,889

it's not really that useful with an

846

00:34:46,960 --> 00:34:45,500

investigation so back to these deaths

847

00:34:49,990 --> 00:34:46,970

the guys investigated and they found

848

00:34:52,690 --> 00:34:50,000

that it was up to only twenty they could

849

00:34:55,089 --> 00:34:52,700

locate and of the twenty one of them was

850

00:34:56,619 --> 00:34:55,099

like a prescription drug overdose there

851  
00:34:59,079 --> 00:34:56,629  
was no cluster I think there were six

852  
00:35:00,730 --> 00:34:59,089  
would do to cardiovascular events and so

853  
00:35:02,650 --> 00:35:00,740  
there was no slip of causation all and

854  
00:35:05,800 --> 00:35:02,660  
they did the stats and was no different

855  
00:35:08,829 --> 00:35:05,810  
than the unvaccinated population but the

856  
00:35:11,109 --> 00:35:08,839  
other thing they noticed was the I think

857  
00:35:12,960 --> 00:35:11,119  
the average time I'm hoping I'm get the

858  
00:35:15,670 --> 00:35:12,970  
numbers right the average time from

859  
00:35:17,650 --> 00:35:15,680  
vaccination to when the first symptom

860  
00:35:20,740 --> 00:35:17,660  
appear that led to this death was about

861  
00:35:22,660 --> 00:35:20,750  
five months right so you get the vaccine

862  
00:35:25,990 --> 00:35:22,670  
on January the first and sometime in

863  
00:35:29,109 --> 00:35:26,000

late May you you feel a bit wonky so

864

00:35:31,329 --> 00:35:29,119

it's it's just people with looking for

865

00:35:34,660 --> 00:35:31,339

something to blame and this vaccine was

866

00:35:36,550 --> 00:35:34,670

new it was contentious was in the news

867

00:35:39,730 --> 00:35:36,560

in this is where I think a lot of these

868

00:35:41,770 --> 00:35:39,740

these myths and and have come from a

869

00:35:42,160 --> 00:35:41,780

number of organizations make a hell of a

870

00:35:45,460 --> 00:35:42,170

lot of

871

00:35:46,839 --> 00:35:45,470

the from scare tactics I've sort of

872

00:35:48,819 --> 00:35:46,849

found myself in the position through

873

00:35:51,309 --> 00:35:48,829

there and I'm sure you have as well as

874

00:35:53,740 --> 00:35:51,319

that I'm a I'm a molecular scientist I

875

00:35:56,049 --> 00:35:53,750

spent five years in a the the second

876  
00:35:58,000 --> 00:35:56,059  
highest level of biological containment

877  
00:36:00,220 --> 00:35:58,010  
working with HIV and I didn't really

878  
00:36:02,260 --> 00:36:00,230  
speak to a lot of people so when

879  
00:36:03,730 --> 00:36:02,270  
actually went out and started and it was

880  
00:36:05,829 --> 00:36:03,740  
a sort of when I was finishing that in

881  
00:36:07,839 --> 00:36:05,839  
transitioning into neuroscience that I I

882  
00:36:11,890 --> 00:36:07,849  
sort of started talking to people about

883  
00:36:14,260 --> 00:36:11,900  
stuff and realizing that people it's

884  
00:36:16,030 --> 00:36:14,270  
this confusion I think Bengal they could

885  
00:36:17,589 --> 00:36:16,040  
put it great that the Daily Mail in the

886  
00:36:18,940 --> 00:36:17,599  
UK is dividing the world into things

887  
00:36:20,349 --> 00:36:18,950  
that cause cancer and things of cure

888  
00:36:22,359 --> 00:36:20,359

cancer and that's how a lot of people

889

00:36:25,150 --> 00:36:22,369

view it they sort of Carol a clinical

890

00:36:27,700 --> 00:36:25,160

trials Jonas this then that that size

891

00:36:30,190 --> 00:36:27,710

that in scientists is evidence at

892

00:36:32,109 --> 00:36:30,200

edifice and I think that trying to

893

00:36:34,270 --> 00:36:32,119

explain to people what these these

894

00:36:35,890 --> 00:36:34,280

results actually mean in terms of if you

895

00:36:37,870 --> 00:36:35,900

have a vaccine in you have a car

896

00:36:40,059 --> 00:36:37,880

accident on the way home would you

897

00:36:42,970 --> 00:36:40,069

consider that a vaccine event and they

898

00:36:45,520 --> 00:36:42,980

go Noah said but according to all the

899

00:36:48,039 --> 00:36:45,530

way that you put data in you would and

900

00:36:49,720 --> 00:36:48,049

that's how I sort of try and explain you

901  
00:36:52,440 --> 00:36:49,730  
know the the correlation versus the

902  
00:36:56,020 --> 00:36:52,450  
causation which is sort of a very off

903  
00:36:57,160 --> 00:36:56,030  
cited phrase tokenized ask you something

904  
00:36:59,770 --> 00:36:57,170  
as a crackle going on in the background

905  
00:37:02,440 --> 00:36:59,780  
are you playing the panel something now

906  
00:37:04,030 --> 00:37:02,450  
I have a eight month old English

907  
00:37:09,250 --> 00:37:04,040  
Springer Spaniel that won't leave me

908  
00:37:10,569 --> 00:37:09,260  
alone so he's chewing on a tennis ball

909  
00:37:12,579 --> 00:37:10,579  
and hopefully that will keep him out the

910  
00:37:14,740 --> 00:37:12,589  
way but I do apologize i'm home alone

911  
00:37:16,690 --> 00:37:14,750  
and he he doesn't like being locked out

912  
00:37:18,609 --> 00:37:16,700  
of the mine oh okay no that's fine i

913  
00:37:23,349 --> 00:37:18,619

could just hear some funny noise but not

914

00:37:24,849 --> 00:37:23,359

know what okay so with respect to the

915

00:37:26,170 --> 00:37:24,859

four questions you've addressed in the

916

00:37:28,750 --> 00:37:26,180

paper the first one you've looked at is

917

00:37:31,120 --> 00:37:28,760

does vaccination against HPV prevent

918

00:37:32,589 --> 00:37:31,130

infection with the virus tell us what

919

00:37:34,240 --> 00:37:32,599

you found out about that well yeah I

920

00:37:36,099 --> 00:37:34,250

mean one of the reasons I actually

921

00:37:38,440 --> 00:37:36,109

phrase that is because people talk about

922

00:37:40,990 --> 00:37:38,450

our vaccines prevent death and vaccines

923

00:37:43,870 --> 00:37:41,000

prevent cancerous like vaccines prevent

924

00:37:45,370 --> 00:37:43,880

the diseases they target and we found

925

00:37:47,380 --> 00:37:45,380

that you know when we looked at all the

926

00:37:50,349 --> 00:37:47,390

data and there's been seven clinical

927

00:37:52,210 --> 00:37:50,359

trials tackling 45 involving 44,000

928

00:37:54,069 --> 00:37:52,220

women that when you give the vaccine to

929

00:37:55,500 --> 00:37:54,079

people that are naive those that haven't

930

00:37:58,230 --> 00:37:55,510

been exposed to HPV

931

00:38:01,440 --> 00:37:58,240

you get a greater than ninety percent

932

00:38:02,850 --> 00:38:01,450

reduction in infection and that's that

933

00:38:04,500 --> 00:38:02,860

includes people that maybe didn't get

934

00:38:06,300 --> 00:38:04,510

all three doses they got at least one

935

00:38:08,670 --> 00:38:06,310

dose but they didn't get all three doses

936

00:38:10,140 --> 00:38:08,680

and they didn't have HPV so it's

937

00:38:11,310 --> 00:38:10,150

probably the most accurate model of

938

00:38:13,280 --> 00:38:11,320

what's actually going to happen in

939

00:38:16,500 --> 00:38:13,290

reality with 12 13 year old kids

940

00:38:18,000 --> 00:38:16,510

probably not going to have HPV a bunch

941

00:38:20,580 --> 00:38:18,010

of them are probably going to miss one

942

00:38:23,010 --> 00:38:20,590

of the injections or not follow up so

943

00:38:26,370 --> 00:38:23,020

with respect to that for example there

944

00:38:28,620 --> 00:38:26,380

was a researcher rather a PhD student at

945

00:38:31,020 --> 00:38:28,630

the University of Wollongong his name is

946

00:38:33,150 --> 00:38:31,030

Judy Wiley man who insists that because

947

00:38:35,070 --> 00:38:33,160

this particular vaccine only prevents

948

00:38:37,440 --> 00:38:35,080

about seventy percent of the viruses

949

00:38:40,440 --> 00:38:37,450

that cause HPV therefore it's useless

950

00:38:42,600 --> 00:38:40,450

how do you explain that that is wrong if

951  
00:38:44,070 --> 00:38:42,610  
you just follow and I'll talk about this

952  
00:38:46,110 --> 00:38:44,080  
load but if you just say that it only

953  
00:38:49,380 --> 00:38:46,120  
targets the two strains which cause

954  
00:38:51,270 --> 00:38:49,390  
cervical cancer 16 and eight any only

955  
00:38:53,100 --> 00:38:51,280  
look at cervical cancer it will prevent

956  
00:38:56,550 --> 00:38:53,110  
probably around seventy percent of

957  
00:38:58,140 --> 00:38:56,560  
deaths there's over 200 cervical cancer

958  
00:39:01,080 --> 00:38:58,150  
deaths in Australia each year so that's

959  
00:39:03,060 --> 00:39:01,090  
about 150 women's lives are saved but

960  
00:39:04,470 --> 00:39:03,070  
then you look at it out instead of you

961  
00:39:06,630 --> 00:39:04,480  
know you've got that too and a hundred

962  
00:39:08,910 --> 00:39:06,640  
thousand women between 20 and 69

963  
00:39:11,400 --> 00:39:08,920

developed cervical can die of cervical

964

00:39:13,290 --> 00:39:11,410

cancer but it's about eight or nine out

965

00:39:15,390 --> 00:39:13,300

of a hundred thousand developed cervical

966

00:39:19,320 --> 00:39:15,400

cancer and on top of that then you've

967

00:39:21,360 --> 00:39:19,330

got that's 72 out of 100,000 developed

968

00:39:25,050 --> 00:39:21,370

sort of these cervical intraepithelial

969

00:39:26,880 --> 00:39:25,060

neoplasia type 3 which are the sort of

970

00:39:28,290 --> 00:39:26,890

the pre cancer markers that you know get

971

00:39:30,900 --> 00:39:28,300

picked up on a pap smear and have to be

972

00:39:32,850 --> 00:39:30,910

burnt off and can often cause problems

973

00:39:34,710 --> 00:39:32,860

with cervix in terms of women who want

974

00:39:38,250 --> 00:39:34,720

to have children and then there's this

975

00:39:40,890 --> 00:39:38,260

steamroller effect so yeah I I think off

976

00:39:42,930 --> 00:39:40,900

the top of my head saving 150 women each

977

00:39:44,340 --> 00:39:42,940

year is worth it but if you actually

978

00:39:46,350 --> 00:39:44,350

look at it in terms of the knockdown

979

00:39:48,870 --> 00:39:46,360

effect these are just the deaths you've

980

00:39:50,910 --> 00:39:48,880

got four and a half times that many

981

00:39:54,270 --> 00:39:50,920

people who actually get cancer and then

982

00:39:57,990 --> 00:39:54,280

eight times as many gets stin three and

983

00:40:01,110 --> 00:39:58,000

then 20 times as many get sin 2 which is

984

00:40:03,270 --> 00:40:01,120

the the categories of the precancerous

985

00:40:05,130 --> 00:40:03,280

lesion so I think that you could

986

00:40:07,380 --> 00:40:05,140

probably make a really strong financial

987

00:40:08,880 --> 00:40:07,390

case that is just working there but the

988

00:40:11,310 --> 00:40:08,890

other thing is I'm a medical

989

00:40:12,930 --> 00:40:11,320

search I kind of don't like keeping up

990

00:40:15,570 --> 00:40:12,940

on anything and this seems like a pretty

991

00:40:17,040 --> 00:40:15,580

easy cheers mmm so one of the other

992

00:40:18,780 --> 00:40:17,050

things you discussed in your review was

993

00:40:21,510 --> 00:40:18,790

whether this vaccination will cause a

994

00:40:24,030 --> 00:40:21,520

compensatory rise in other non vaccine

995

00:40:26,490 --> 00:40:24,040

HPV types what's the evidence out there

996

00:40:28,800 --> 00:40:26,500

to suggest that won't be the case I

997

00:40:30,810 --> 00:40:28,810

spent my life working on HIV for five

998

00:40:32,790 --> 00:40:30,820

years and you certainly see different

999

00:40:34,620 --> 00:40:32,800

sentencing drug you know when you add a

1000

00:40:36,060 --> 00:40:34,630

drug you get different strains of HIV

1001  
00:40:37,170 --> 00:40:36,070  
coming up and so this was something I

1002  
00:40:39,570 --> 00:40:37,180  
thought was really interesting to

1003  
00:40:42,690 --> 00:40:39,580  
investigate so there's about 15 strains

1004  
00:40:44,970 --> 00:40:42,700  
it's over 100 types of HIV HPV sorry

1005  
00:40:47,310 --> 00:40:44,980  
there's about 15 that cause cancer the

1006  
00:40:49,440 --> 00:40:47,320  
all the vaccines target the two most

1007  
00:40:51,810 --> 00:40:49,450  
common causes of cervical cancer 16 and

1008  
00:40:53,670 --> 00:40:51,820  
18 but then if you actually look at the

1009  
00:40:56,070 --> 00:40:53,680  
vaccines they actually significantly

1010  
00:40:58,650 --> 00:40:56,080  
reduce infection with a further five of

1011  
00:41:01,530 --> 00:40:58,660  
these cancer-causing and the severity

1012  
00:41:04,530 --> 00:41:01,540  
that only targets to cancer strains

1013  
00:41:06,840 --> 00:41:04,540

actually gets a further two so all of

1014

00:41:08,850 --> 00:41:06,850

both vaccines tied at seven strains and

1015

00:41:11,190 --> 00:41:08,860

reduce them so that's half the cancer

1016

00:41:13,710 --> 00:41:11,200

one is reduced and then one of them can

1017

00:41:15,750 --> 00:41:13,720

target an extra two and that means okay

1018

00:41:17,730 --> 00:41:15,760

they reduce those but to those other

1019

00:41:19,250 --> 00:41:17,740

nine go up and there's nothing that

1020

00:41:21,180 --> 00:41:19,260

shows that they go up there's no

1021

00:41:23,190 --> 00:41:21,190

significant difference in the rate of

1022

00:41:25,320 --> 00:41:23,200

infection of any of the other

1023

00:41:27,510 --> 00:41:25,330

cancer-causing strains so it not only

1024

00:41:29,490 --> 00:41:27,520

none of them go up to compensate for

1025

00:41:32,460 --> 00:41:29,500

this sort of gap with the 16 and 18

1026

00:41:33,750 --> 00:41:32,470

caused infections but the half of them

1027

00:41:35,360 --> 00:41:33,760

actually go down because they're close

1028

00:41:38,010 --> 00:41:35,370

enough related that the vaccine works

1029

00:41:40,020 --> 00:41:38,020

recently efficiently on them as well Wow

1030

00:41:43,920 --> 00:41:40,030

so are you saying that vaccines work

1031

00:41:45,660 --> 00:41:43,930

Dave yeah who woulda thunk ER did you

1032

00:41:48,540 --> 00:41:45,670

know hundred use a science and I think

1033

00:41:51,840 --> 00:41:48,550

was that there was over 200 human

1034

00:41:53,820 --> 00:41:51,850

clinical trials since on the HPV vaccine

1035

00:41:56,220 --> 00:41:53,830

and it's been registered for I think

1036

00:41:58,320 --> 00:41:56,230

seven years so that people are still

1037

00:42:00,510 --> 00:41:58,330

looking at things but the evidence seems

1038

00:42:02,670 --> 00:42:00,520

pretty strong for this one and most of

1039

00:42:04,110 --> 00:42:02,680

the other ones as well so um can you

1040

00:42:06,120 --> 00:42:04,120

explain to our listeners and why is it

1041

00:42:07,830 --> 00:42:06,130

being given to males because some people

1042

00:42:09,900 --> 00:42:07,840

don't seem to understand is that it's

1043

00:42:13,020 --> 00:42:09,910

not you don't just have to have a cervix

1044

00:42:15,150 --> 00:42:13,030

to get this vaccine do you know I this

1045

00:42:18,930 --> 00:42:15,160

to Bree since the first is that you know

1046

00:42:22,230 --> 00:42:18,940

women contract HPV generally from men

1047

00:42:23,880 --> 00:42:22,240

because most women have

1048

00:42:25,950 --> 00:42:23,890

sex with men you know men can be this

1049

00:42:28,440 --> 00:42:25,960

reservoir of HPV so if you stop them

1050

00:42:30,440 --> 00:42:28,450

getting it then women can't get it and

1051

00:42:32,760 --> 00:42:30,450

that in itself is a pretty good reason

1052

00:42:35,850 --> 00:42:32,770

it's sort of you know becoming a bit of

1053

00:42:38,460 --> 00:42:35,860

sort of sexual herd immunity hmm but the

1054

00:42:39,960 --> 00:42:38,470

other the other reason is that HPV is

1055

00:42:42,390 --> 00:42:39,970

certainly linked with ninety nine point

1056

00:42:43,830 --> 00:42:42,400

seven percent of cervical cancers what

1057

00:42:46,020 --> 00:42:43,840

most people don't know is that it's

1058

00:42:47,790 --> 00:42:46,030

linked to ninety percent of anal cancers

1059

00:42:50,609 --> 00:42:47,800

I think it's forty percent of penis

1060

00:42:54,090 --> 00:42:50,619

cancers and my disguise have both of

1061

00:42:56,930 --> 00:42:54,100

those things and pretty much they're not

1062

00:42:59,280 --> 00:42:56,940

places you really want to get cancer

1063

00:43:01,010 --> 00:42:59,290

you've also got twelve percent of auto

1064

00:43:03,240 --> 00:43:01,020

larynx so that's sort of the throat

1065

00:43:04,800 --> 00:43:03,250

cancers are linked to HIV and three

1066

00:43:08,490 --> 00:43:04,810

percent of mouth cancer so you've got

1067

00:43:11,280 --> 00:43:08,500

these cancers that you know certainly

1068

00:43:14,820 --> 00:43:11,290

affect men and their 40 and ninety

1069

00:43:17,190 --> 00:43:14,830

percent is a really significant number

1070

00:43:19,200 --> 00:43:17,200

that you know you could reduce with with

1071

00:43:20,460 --> 00:43:19,210

a vaccine Wow so just finally the last

1072

00:43:23,280 --> 00:43:20,470

thing you looked at obviously was the

1073

00:43:25,080 --> 00:43:23,290

safety profile of HPV and in asking you

1074

00:43:26,820 --> 00:43:25,090

that question can you can you approach

1075

00:43:29,609 --> 00:43:26,830

that from the perspective of explaining

1076  
00:43:31,620 --> 00:43:29,619  
to us why Japan has pulled HPV yeah

1077  
00:43:33,090 --> 00:43:31,630  
Japan hasn't actually pulled the back

1078  
00:43:34,800 --> 00:43:33,100  
seen what they've actually done is said

1079  
00:43:36,090 --> 00:43:34,810  
the government's going to stop giving it

1080  
00:43:37,440 --> 00:43:36,100  
it's not it's still going to be

1081  
00:43:38,730 --> 00:43:37,450  
available if you go into your doctoring

1082  
00:43:39,840 --> 00:43:38,740  
you want you can go and get it but

1083  
00:43:41,280 --> 00:43:39,850  
they're just stopping their program

1084  
00:43:44,790 --> 00:43:41,290  
whether they're actually causing it

1085  
00:43:47,130 --> 00:43:44,800  
because it had a variety of essentially

1086  
00:43:48,930 --> 00:43:47,140  
these adverse reactions and from what

1087  
00:43:50,370 --> 00:43:48,940  
I've read now I've not had a chance the

1088  
00:43:52,080 --> 00:43:50,380

last two days to read too much about it

1089

00:43:54,990 --> 00:43:52,090

but it seems to be sort of pain or

1090

00:43:56,970 --> 00:43:55,000

temporary paralysis and the sort of

1091

00:43:58,859 --> 00:43:56,980

things that are there this sort of

1092

00:44:00,120 --> 00:43:58,869

difficult to understand we don't know

1093

00:44:01,950 --> 00:44:00,130

what causes a lot of these things

1094

00:44:05,310 --> 00:44:01,960

generally and so for it to be caused by

1095

00:44:06,750 --> 00:44:05,320

vaccine is it's possible but the the

1096

00:44:08,130 --> 00:44:06,760

government's showing what I think is a

1097

00:44:09,750 --> 00:44:08,140

bit of due diligence I think they're

1098

00:44:11,730 --> 00:44:09,760

kind of going the vaccine was only

1099

00:44:14,099 --> 00:44:11,740

introduced in Japan relatively recently

1100

00:44:16,109 --> 00:44:14,109

so as I sort of said about Australia you

1101

00:44:17,670 --> 00:44:16,119

kind of get this nervy of the first

1102

00:44:19,380 --> 00:44:17,680

round of people getting the vaccine and

1103

00:44:21,690 --> 00:44:19,390

having this higher rate of adverse

1104

00:44:23,340 --> 00:44:21,700

events so with without I think that's

1105

00:44:24,660 --> 00:44:23,350

what it is and i think that the japanese

1106

00:44:26,640 --> 00:44:24,670

are just kind of going we're just going

1107

00:44:27,960 --> 00:44:26,650

to stop we're going to have a look we're

1108

00:44:30,420 --> 00:44:27,970

going to actually investigate these

1109

00:44:32,310 --> 00:44:30,430

reports and we'll see where we stand but

1110

00:44:34,200 --> 00:44:32,320

i mean it's the same vaccine as being in

1111

00:44:36,090 --> 00:44:34,210

Australia for six years it's the same

1112

00:44:39,810 --> 00:44:36,100

vaccine that's in the States

1113

00:44:42,870 --> 00:44:39,820

it's unlikely I never say never because

1114

00:44:45,450 --> 00:44:42,880

you know who knows I never say it's

1115

00:44:47,310 --> 00:44:45,460

unlikely to be causing these effects and

1116

00:44:50,040 --> 00:44:47,320

they're not not anything we've actually

1117

00:44:51,540 --> 00:44:50,050

picked up I mean in Australia with in

1118

00:44:53,550 --> 00:44:51,550

the first couple of years they found a

1119

00:44:55,860 --> 00:44:53,560

high rate of fainting amongst teenage

1120

00:44:58,320 --> 00:44:55,870

girls who are getting the vaccine which

1121

00:45:00,090 --> 00:44:58,330

they kind of eventually put down to you

1122

00:45:02,310 --> 00:45:00,100

have a higher rate of fainting amongst

1123

00:45:04,890 --> 00:45:02,320

teenage girls you do get these odd

1124

00:45:06,930 --> 00:45:04,900

things particular with new vaccines and

1125

00:45:08,430 --> 00:45:06,940

particular with vaccines about diseases

1126

00:45:11,760 --> 00:45:08,440

that you're not going to see for 10 or

1127

00:45:12,870 --> 00:45:11,770

20 years and that a sexually-transmitted

1128

00:45:15,420 --> 00:45:12,880

there's all these different things that

1129

00:45:17,760 --> 00:45:15,430

play on people's minds can you tell us a

1130

00:45:20,010 --> 00:45:17,770

little bit about post sort of marketing

1131

00:45:21,660 --> 00:45:20,020

surveillance data so at this time with

1132

00:45:24,060 --> 00:45:21,670

this vaccine we're still collecting data

1133

00:45:25,650 --> 00:45:24,070

on safety of it aren't we yeah I mean

1134

00:45:27,510 --> 00:45:25,660

we're still collecting data and I

1135

00:45:30,450 --> 00:45:27,520

imagine we'll keep on collecting data

1136

00:45:32,240 --> 00:45:30,460

for a very long time the sort of looking

1137

00:45:36,270 --> 00:45:32,250

at these adverse reports and there was a

1138

00:45:38,100 --> 00:45:36,280

study done in I think 2010 by Peter

1139

00:45:40,140 --> 00:45:38,110

McIntyre in Australia that looked at the

1140

00:45:43,260 --> 00:45:40,150

adverse events with the rollout of HPV

1141

00:45:46,310 --> 00:45:43,270

so this is that government or sort of

1142

00:45:48,570 --> 00:45:46,320

government funded study no links to

1143

00:45:51,660 --> 00:45:48,580

pharmaceutical companies looking at post

1144

00:45:54,810 --> 00:45:51,670

marketing they had 1394 adverse

1145

00:45:57,270 --> 00:45:54,820

reactions with 5.8 million doses

1146

00:46:00,200 --> 00:45:57,280

distributed so if every girl got three

1147

00:46:02,370 --> 00:46:00,210

doses is about 1.9 million people and

1148

00:46:03,930 --> 00:46:02,380

what they found was pretty much what

1149

00:46:06,570 --> 00:46:03,940

they've found with other studies that

1150

00:46:08,460 --> 00:46:06,580

you've got side effects but the pattern

1151  
00:46:10,890 --> 00:46:08,470  
ninety-four ninety-five percent of them

1152  
00:46:13,230 --> 00:46:10,900  
a minor so you saw arm your redness your

1153  
00:46:15,480 --> 00:46:13,240  
injection site obviously you do get that

1154  
00:46:17,220 --> 00:46:15,490  
sort of fainting and headaches and the

1155  
00:46:19,530 --> 00:46:17,230  
general malaise last for a couple of

1156  
00:46:21,510 --> 00:46:19,540  
days that could or could not be due to

1157  
00:46:24,000 --> 00:46:21,520  
the vaccine the only thing they found

1158  
00:46:25,650 --> 00:46:24,010  
was that there was some they found that

1159  
00:46:27,330 --> 00:46:25,660  
there was an increase in one particular

1160  
00:46:29,580 --> 00:46:27,340  
side effect and they found that it was

1161  
00:46:33,390 --> 00:46:29,590  
only New South Wales not in Victoria

1162  
00:46:35,220 --> 00:46:33,400  
which was strange in itself this side

1163  
00:46:36,630 --> 00:46:35,230

effect occurred and they saying it's at

1164

00:46:38,610 --> 00:46:36,640

a rate higher than what they're

1165

00:46:41,580 --> 00:46:38,620

expecting but then when you looked at it

1166

00:46:43,650 --> 00:46:41,590

was actually 12 individuals as 12 girls

1167

00:46:45,930 --> 00:46:43,660

one of the possible sites was this

1168

00:46:47,840 --> 00:46:45,940

anaphylaxis which again is a fairly

1169

00:46:49,340 --> 00:46:47,850

common side effect because you know

1170

00:46:51,440 --> 00:46:49,350

vaccines are made with eggs but they

1171

00:46:54,590 --> 00:46:51,450

found that it was his increased in New

1172

00:46:57,560 --> 00:46:54,600

South Wales it was 2.6 400,000 compared

1173

00:46:59,660 --> 00:46:57,570

with 0 point 5 in Victoria point so as

1174

00:47:02,150 --> 00:46:59,670

five times as high but there are only 12

1175

00:47:04,550 --> 00:47:02,160

cases so it's really hard to detect but

1176

00:47:05,990 --> 00:47:04,560

even if you dig in anaphylaxis and at

1177

00:47:08,480 --> 00:47:06,000

all these girls recovered without a

1178

00:47:10,880 --> 00:47:08,490

problem the rate for anaphylaxis pretty

1179

00:47:14,420 --> 00:47:10,890

much mirrors the exact same rate of

1180

00:47:16,130 --> 00:47:14,430

cervical cancer deaths so there's your

1181

00:47:18,140 --> 00:47:16,140

chance you've got a two and a hundred

1182

00:47:20,420 --> 00:47:18,150

thousand chance of getting an adverse an

1183

00:47:22,910 --> 00:47:20,430

anaphylactic reaction which we now are

1184

00:47:24,470 --> 00:47:22,920

aware of and monitor or you have exactly

1185

00:47:26,630 --> 00:47:24,480

the same risk when you don't get the

1186

00:47:28,790 --> 00:47:26,640

vaccine of of getting and dying of

1187

00:47:30,830 --> 00:47:28,800

cervical cancer alright Dave well I

1188

00:47:32,090 --> 00:47:30,840

might leave it there but um we want

1189

00:47:34,580 --> 00:47:32,100

everyone obviously to go and read your

1190

00:47:37,250 --> 00:47:34,590

paper it's open access so we can all see

1191

00:47:40,330 --> 00:47:37,260

it absolutely it's um it's freely

1192

00:47:42,950 --> 00:47:40,340

available it's at infectious agents and

1193

00:47:45,410 --> 00:47:42,960

cancer David Hawks on the first author

1194

00:47:48,080 --> 00:47:45,420

at the moment where the where the top

1195

00:47:49,640 --> 00:47:48,090

article where a little window with most

1196

00:47:51,890 --> 00:47:49,650

recent review and we're on that and

1197

00:47:53,960 --> 00:47:51,900

please feel free to access that have a

1198

00:47:56,540 --> 00:47:53,970

read if you've got any questions i'm on

1199

00:47:59,150 --> 00:47:56,550

twitter at mr. Hawks so that's at mr.

1200

00:48:01,550 --> 00:47:59,160

Hawks and yet feel free to drop me a

1201  
00:48:04,550 --> 00:48:01,560  
line great well thanks David and I hope

1202  
00:48:07,280 --> 00:48:04,560  
this is the first of many SI bien

1203  
00:48:09,020 --> 00:48:07,290  
related publications I'm in particular

1204  
00:48:11,750 --> 00:48:09,030  
because i don't think the avian have any

1205  
00:48:14,060 --> 00:48:11,760  
yet do they know i'm as i said i've been

1206  
00:48:16,100 --> 00:48:14,070  
involved in these stop the avian for

1207  
00:48:18,950 --> 00:48:16,110  
less than four out three and a half

1208  
00:48:22,070 --> 00:48:18,960  
years and we've got a publication

1209  
00:48:23,510 --> 00:48:22,080  
they've had the ABN for 19 years and an

1210  
00:48:25,040 --> 00:48:23,520  
income of what is it about three hundred

1211  
00:48:28,160 --> 00:48:25,050  
thousand dollars a year for a lot of

1212  
00:48:30,620 --> 00:48:28,170  
that time and still no publications so

1213  
00:48:31,850 --> 00:48:30,630

are we are certainly value for money so

1214

00:48:34,340 --> 00:48:31,860

if the government wants to actually give

1215

00:48:35,960 --> 00:48:34,350

us a grand I reckon look at my they'll

1216

00:48:38,600 --> 00:48:35,970

get value for money for her that would

1217

00:48:40,610 --> 00:48:38,610

be fantastic alright well thank you go

1218

00:48:42,560 --> 00:48:40,620

to david hawks who is a research officer

1219

00:48:45,470 --> 00:48:42,570

at the flory institute of neuroscience

1220

00:48:52,930 --> 00:48:45,480

of mental health in victoria nice thanks

1221

00:48:57,200 --> 00:48:55,760

hey guys this is jay from the skeptics

1222

00:48:59,810 --> 00:48:57,210

guide to the universe er whoa whoa whoa

1223

00:49:01,220 --> 00:48:59,820

hold on whoa everybody knows I'm the

1224

00:49:03,140 --> 00:49:01,230

only reason to listen to the Freak Show

1225

00:49:09,020 --> 00:49:03,150

right I mean it was up to me the show

1226

00:49:11,450 --> 00:49:09,030

would start with this yeah boy well

1227

00:49:13,310 --> 00:49:11,460

Rebecca would hate that probably but I

1228

00:49:14,600 --> 00:49:13,320

mean I'd rock that listen to our show

1229

00:49:16,400 --> 00:49:14,610

and you can learn about cool stuff like

1230

00:49:18,140 --> 00:49:16,410

a technological singularity which is

1231

00:49:19,670 --> 00:49:18,150

someday when technology progresses so

1232

00:49:21,050 --> 00:49:19,680

fast that it would make the Industrial

1233

00:49:24,080 --> 00:49:21,060

Revolution look like a kid science

1234

00:49:47,180 --> 00:49:24,090

project anyway come check us out at WWDC

1235

00:49:50,910 --> 00:49:49,320

thank you for listening to the skeptic

1236

00:49:54,360 --> 00:49:50,920

zone with the rain still pelting down

1237

00:49:56,790 --> 00:49:54,370

outside here in Sydney Australia folks I

1238

00:49:59,220 --> 00:49:56,800

can't wait I can't wait to get better

1239

00:50:03,600 --> 00:49:59,230

but I can't wait to get on that plane in

1240

00:50:05,910 --> 00:50:03,610

a week or so and head to the USA and get

1241

00:50:08,490 --> 00:50:05,920

ready for the amazing meeting in Las

1242

00:50:10,920 --> 00:50:08,500

Vegas if you haven't bought your tickets

1243

00:50:13,350 --> 00:50:10,930

yet it's time to do so the amazing

1244

00:50:16,010 --> 00:50:13,360

meeting in Las Vegas meet James Randi DJ

1245

00:50:19,470 --> 00:50:16,020

Grothe and a host of other fabulous

1246

00:50:21,930 --> 00:50:19,480

skeptics I can't wait to get there i'll

1247

00:50:24,000 --> 00:50:21,940

be doing water divining demonstrations

1248

00:50:25,590 --> 00:50:24,010

and power balance demonstrations in the

1249

00:50:29,760 --> 00:50:25,600

hall i'll be giving a talk on the main

1250

00:50:32,130 --> 00:50:29,770

stage very exciting very exciting if you

1251

00:50:35,160 --> 00:50:32,140

come along drop by and say hello and i

1252

00:50:36,420 --> 00:50:35,170

shall offer you a must stick in fact i

1253

00:50:40,170 --> 00:50:36,430

know some good friends of mine from

1254

00:50:42,990 --> 00:50:40,180

around Australia are also flying to the

1255

00:50:45,090 --> 00:50:43,000

amazing meeting and if you are I

1256

00:50:46,890 --> 00:50:45,100

encourage you friends from around

1257

00:50:49,110 --> 00:50:46,900

Australia bring the packet of must

1258

00:50:51,630 --> 00:50:49,120

explore than better I always run out

1259

00:50:55,650 --> 00:50:51,640

when I'm there because I know how how

1260

00:50:57,720 --> 00:50:55,660

much americans love to taste mastics yes

1261

00:50:59,850 --> 00:50:57,730

with that day yummy thought in my mind

1262

00:51:02,310 --> 00:50:59,860

it's time for me to say this is Richard

1263

00:51:09,540 --> 00:51:02,320

Saunders thanking you once again and

1264

00:51:12,930 --> 00:51:09,550

signing off from Sydney Australia you've

1265

00:51:17,520 --> 00:51:12,940

been listening to the skeptic zone visit

1266

00:51:20,010 --> 00:51:17,530

her website at [www.skeptics.org](http://www.skeptics.org) on TV for