

Title: Orphan Works IA No: BIS1063 Lead department or agency: IPO Other departments or agencies:	Impact Assessment (IA)		
	Date: 15/06/2012		
	Stage: Final		
	Source of intervention: Domestic		
	Type of measure: Primary legislation		
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Summary: Intervention and Options	RPC Opinion: AMBER
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Cost of Preferred (or more likely) Option			
Total Net Present Value	Business Net Present Value	Net cost to business per year (EANCB on 2009 prices)	In scope of One-In, Measure qualifies as One-Out?
£417m	£34m	-£4m	Yes OUT

What is the problem under consideration? Why is government intervention necessary?
A copyrighted work is considered an orphan when it is not possible to locate the right-holders after a diligent search. If a work is orphaned it is not possible to seek permissions or licences to use the content, and therefore it cannot be used lawfully and its value to society is lost. This is a regulatory failure. Private sector attempts to create a market are prohibited by the law, which renders anyone attempting to exploit orphan works liable to civil pursuit if the owner should reappear, and to criminal penalties for exploitation on any commercial scale. The government cannot condone such a black market. This intervention is designed to make such works available while protecting the rights of absent owners.

What are the policy objectives and the intended effects?
The aim is to create a system where people interested in using orphan works for commercial or non-commercial purposes can obtain permissions to use the works lawfully in the UK, following a diligent search, and by paying appropriate licence fees up-front.

This should create a system where archive holders are incentivised to use and make available their archives, and pay right-holders (whether identified or not) for doing so. The permission system will allow efficient registry of orphans through an authorising body which will accredit institutions.

What policy options have been considered, including any alternatives to regulation? Please justify preferred option (further details in Evidence Base)
Option 0 - Do nothing.
Option 1 - Legislation to allow the use of orphan works subject to safeguards. In either case there may be a separate proposal to develop a Digital Copyright Exchange that would affect the operation of an orphan works scheme (see end of this IA).

Option 1 is the preferred option as a non-legislative solution is unlikely to be compatible with international obligations, and it maximizes economic benefits. A large share of private benefits are not included in the net cost to business estimate, as the One-In One-Out guidance classifies them as indirect benefits (see p.14). This is in line with the Hargreaves Review's proposal on orphan works and is compatible with the European Commission's proposed Directive on orphan works.

Will the policy be reviewed? It will be reviewed. If applicable, set review date: 04/2015					
Does implementation go beyond minimum EU requirements?				N/A	
Are any of these organisations in scope? If Micros not exempted set out reason in Evidence Base.		Micro Yes	< 20 Yes	Small Yes	Medium Yes
What is the CO ₂ equivalent change in greenhouse gas emissions? (Million tonnes CO ₂ equivalent)				Traded: N/A	Non-traded: N/A

I have read the Impact Assessment and I am satisfied that (a) it represents a fair and reasonable view of the expected costs, benefits and impact of the policy, and (b) that the benefits justify the costs.

Signed by the responsible SELECT SIGNATORY: _____ Date: _____

Summary: Analysis & Evidence

Policy Option 1

Description: Legislate to allow the use of orphan works

FULL ECONOMIC ASSESSMENT

Price Base Year 2010	PV Base Year 2010	Time Period Years 10	Net Benefit (Present Value (PV)) (£m)		
			Low: -724	High: 1,557	Best Estimate: 416

COSTS (£m)	Total Transition (Constant Price) Years	Average Annual (excl. Transition) (Constant Price)	Total Cost (Present Value)
Low	3	32	273
High	10	124	1,076
Best Estimate	7	77	670

Description and scale of key monetised costs by 'main affected groups'

The main costs of this proposal are the public expenditure of setting up the authorising body (£2.5m-£10m transition cost), see p6; running the body itself (£0.5m-£1.8m p.a.), see p6; and the costs of undertaking diligent searches by potential users, as museums, galleries, libraries and archives are incentivised to search their collections, but this would be voluntary and only done if the potential users believe it worth the effort (£31m-£122m p.a.), see p7.

Other key non-monetised costs by 'main affected groups'

Existing unlawful uses in the UK are likely to be reduced by the availability of lawful licensed use, thus transferring some value from former infringers to rights owners, but this transfer has not been monetised, and is net neutral.

BENEFITS (£m)	Total Transition (Constant Price) Years	Average Annual (excl. Transition) (Constant Price)	Total Benefit (Present Value)
Low	0	41	352
High	0	220	1,831
Best Estimate	0	130	1,087

Description and scale of key monetised benefits by 'main affected groups'

The main benefits are the value to archives generally from using orphan works £2m-£76m p.a, see p11; the value of using works which are searched because of the orphan works system incentivising effect and finding right-holders £29m-£46m p.a, see p12 ; a net benefit to museums being able to display more of their current holdings: £1m-£7m p.a. on average, see p13 ; and an indirect benefit to growth and business creation from commercialising orphan content £9m-£91m p.a. on average, see p14

Other key non-monetised benefits by 'main affected groups'

There will be a potential benefit to orphan work users from legal certainty in the UK; a benefit from records of past diligent searches; a benefit of expanded resource database for research and educational purposes; a benefit of increased confidence in the copyright system; and benefits to firms commercialising orphan content for use in business areas that stretch beyond genealogy related work.

Key assumptions/sensitivities/risks	Discount rate (%)	3.5
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The scope of this legislation includes many different markets (eg: music, books, audio-visual, photographs) and we have used consultation responses to refine assumptions about the scale of the problem where we use the largest UK archives as proxies, and rely on orphan work estimates. We also assume that the US genealogy market and its experience with content that would be orphan in the UK is a good proxy for how UK markets will respond.

BUSINESS ASSESSMENT (Option 1)

Direct impact on business (Equivalent Annual) £m:	In scope of OIOO?	Measure qualifies as
Costs: 73.8	Yes	OUT
Benefits: 77.8		
Net: 3.9		

Evidence Base (for summary sheets)

- **Problem under consideration;**

A copyrighted work is considered an orphan when it is not possible to locate the right-holders after a diligent search. If a work is orphaned it is not possible to seek permissions or licences to use the content, and therefore it cannot be used or performed without legal risk: As it is not possible to obtain permission for use, there is at least the risk of civil infringement or criminal liability if there is commercial use.

The orphan works problem has resulted in large quantities of copyright works being unavailable for use, whether for cultural or commercial purposes. This concerns millions of pieces of content ranging from video and sound recording, as in the British Film Institute where 10% of the collection is orphaned to more than two million archive photos in the Imperial War Museum and artworks. There are also approximately 150 miles of shelved documents in The National Archives and National Records of Scotland, where up to 40% of the content is suspected orphans.

Both the Hargreaves Review of Intellectual Property and Growth [1], and the Gowers Review of Intellectual Property [2] identified Orphan Works as a problem that needed resolving to avoid leaving large parts of content unavailable for use and missing commercial opportunities.

- **Rationale for intervention;**

Private sector solutions have been proposed in the past and are, for the most part, based on using insurance to indemnify users of orphan works against subsequent legal challenges (i.e. if the owner of the right later comes forward). While Government does, as a rule, prefer industry led solutions, the current state of the law does not make the private sector initiatives legally possible. The orphan works problem therefore results in a missing market which the private sector cannot solve. The full demand for authorised orphan works can only be satisfied by government intervention in the form of legislative changes. This may also stem existing unauthorised use of works and encourage respect for copyright.

Furthermore the Government has agreed to accept Hargreaves's Recommendation to introduce legislation that will enable the use of orphan works. At the same time, the European Commission has proposed a draft Directive on Orphan Works, noted below in the "wider context" section. These are the external drivers for intervention.

The only way to address this issue and to allow the fair and regulated use of the large amount of material containing orphaned rights within the UK is to amend legislation to allow for approved authorisation on a regulated basis.

- **Policy objective;**

The aim is to create a system where people interested in using orphan works for commercial or non-commercial purposes can obtain permissions to use the works lawfully, following a diligent search, and by paying fees up-front. This should enable the use of orphan works; reduce legal uncertainty for users of orphan works; ensure that right-holders can see what content is being used; and give returning right-holders easy access to any fees that have been paid. By providing a lawful alternative it should reduce unlawful use of these works and encourage respect for copyright.

This proposal is intended to facilitate the use of orphan works, by giving the Secretary of State the power to make regulations to create an orphan works authorising body (possibly as part of the existing Copyright Tribunal and possibly with some role for collecting societies) which would maintain a registry of orphan works; set fees; levy fees; approve third parties who wish to use orphan works; ensure that appropriate diligent searches are undertaken and approve individual uses. They would enforce the diligent searches in similar fashion to other regulatory quality checking, by random sampling of orphan works associated with institutions or content, having guidelines for what constitutes a diligent search, and having the power to exclude organisations that do not continue to meet the required standards.

This should create a system where archive holders (including museums, galleries and libraries and not just archives in the strict sense) are incentivised to use and make available their archives, and pay fees for right-holders whether identified or not, for the ability to do so. By allowing the use of orphan works, archives would be incentivised to search their archives as all content would potentially be available for

use – against payment. As part of the consultation major archives, museums, galleries and libraries confirmed that they are interested in utilising such a system. The system would ensure that diligent searches are undertaken and that orphans are registered with the authorising body in a simple manner.

- **Description of options considered (including do nothing);**

Option 0: Do Nothing

Doing nothing would not change the current system and leave orphan works as a largely untapped resource for creativity, innovation and growth, in creative output.

- Risks and assumptions;

- Risks failing the government's commitment to implement an orphan work solution
- Risks loss of important cultural material because archives cannot afford to preserve it without being able to recoup their costs through use of the material
- The Government has received comments that the ability to utilise orphaned works on a basis backed by statute is likely to increase overall confidence in copyright per se, so not fulfilling that promise may have a negative impact.

Option 1: Establish an orphan works system

We have considered whether there is a non-legislative solution but have concluded that any such solution is unlikely to be compatible with our international treaties, such as the Berne Convention.

Briefly, our international obligations state that signatories may permit the reproduction of copyrighted works in certain special cases, provided that such reproduction does not conflict with a normal exploitation of the work and does not unreasonably prejudice the legitimate interests of the author. This means that any exception or limitation in copyright law must meet this test.

Another idea suggested in the past by industry was to annul protection for orphan works in law, but Government legal advice suggests that this would contravene the UK's international treaty obligations. If the UK were to annul protection for orphan works and let anybody use them in any way, without any consideration for the economic and moral rights of rights holders, this would likely conflict with normal exploitation and with the legitimate interests of the author. This could mean people using orphan works without even trying to find the rights holder/s. If a rights holder came forward it would be difficult for them to gain recompense and regain control of their work. Without having rules about remuneration it is likely that no money would be put aside for them. This could skew the market for known and commissioned works, if orphan works were available for use with no fee. It would also leave orphaned content open to misuse, and without any form of compensation to right-holders.

So, under international obligations, unless there is an exception or limitation, potential users of copyrighted works must gain permission to copy the work from the rights holder or their representative. Currently, UK law has no exception or limitation in relation to orphan works. Non-legislative solutions such as insurances or merely minimising the penalties/damages if a diligent search has been conducted (the latter still requiring a legislative change anyway) amount to Government condoning unlawful action

Therefore, we are left with either doing nothing or creating a system for authorising the use of orphan works, which may in time benefit from a Digital Copyright Exchange, if industry decides to set one up.

There are many ways to create an orphan works system and we have drawn on the experience of countries that have orphan works systems, Hungary and Canada, and countries who have tried to address, USA, or do address parts of the orphan works issue, such as Japan and India, through other legal means. Moreover we have consulted [12] on the desirability, efficiency and use of different features to an orphan works system to ensure that a UK solution benefits both users and right-holders while keeping within international obligations.

On the basis of this, the orphan works system we propose is one which would cover only use in the UK, as we cannot permit uses outside the UK [consultation question 4, 5].

Unpublished material [consultation question 7] should be included in the material that can be declared orphan but subject to certain safeguards. Responses to the consultation indicated that the major problem is with cultural organisations such as museums, galleries, libraries and archives, and in these organisations large holdings are unpublished documents. The moral rights of returning right-holders would be no different from that set out in current copyright law, so there should not be a conflict of interest for returning right-holders, which was a concern of some respondents. There may be extra protection for such works in relation to ensuring credits where names are known, and to restricting modification of works. Experience from these institutions suggests that where unpublished works have been displayed or used, the majority of right-holders do not re-appear, and those who do have been pleased to see the work brought to public attention.

Orphan works can be used for both non-commercial and commercial purposes [consultation question 9]. There was broad support for orphan works to be available for commercial uses, which is similar to the Canadian system, where commercial use made up half of the applications to use an orphan work in the period from 1999 to 2009 [15]. This is partly because it is difficult to differentiate commercial from non-commercial use.

Fee setting [consultation question 16, 17] would be part of the draft regulations of the authorising body, based on a model with a fixed fee and/or percentage royalty depending on the content and use. It would be proportional to the intended use and would – in the case of fixed fees - be paid up-front to the authorising body.

The function of the authorising body on validation: As suggested in numerous consultation stakeholder meetings and submissions, “the evidence from Canada and Japan very strongly suggests that a scheme which requires individual authorisation via a bureaucratic procedure is likely to be very little used” [19]. Therefore the registry would not generally validate individual diligent searches but would instead take a standard regulatory approach to testing the quality of searches. This means the authorising body would effectively accredit institutions who wish to register orphan works, which will have to undertake a diligent search on each work registered orphan. The authorising body would regularly test the quality of searching and the methods of accredited institutions through a sampling approach – where they take a sample of diligent searches and ensure that the quality of search is sufficient. This is similar to methods employed in pharmaceuticals and other government quality assurance.

However, where for example the authorising body was approached by an individual (meaning not a body that has shown it has met the necessary standards) verification of the individual diligent search would be necessary.

Managing the authorising body [consultation question 11] will be done centrally by the public sector, but with potential for partnering with collecting societies. For an authorisation system to operate, a list of those works found to be orphaned following a diligent search will be needed. Some collecting societies have said that they would be best placed to license orphan works where they already manage relevant rights. However, many of the orphan works do not fall into the categories that they license. There may be a role for licensing orphan works where the work and they type of use is clearly something the collecting society already carries out (such as inclusion of an orphan poem in an anthology of poems), but this would have to be established in the regulations of the body. Throughout the consultation responses it was felt that the orphan work registry should be publicly accessible; this is intended. The authorising body would likely be a publicly managed system, initially funded by the IPO and possibly over time funded along the same lines as a collecting society with administrative costs charged from users, thereby ensuring that returning right-holders claim the full licence fee.

The authorising body would probably not take on diligent searches for clients [consultation question 13]. It was suggested in the consultation that the authorising body could take on the role of diligent searching for a fee, but respondents agreed that this would depend on whether it had the necessary experience and access to databases to carry out a high quality search. Moreover, as the recipient of orphan work fees, there could be a conflict of interest as there would be concern that the authorising body could subsidise such search activity with collected fees and distort private market providers for such services. One example of such a service is the ‘rights identification service’ provided by the Publishers Licensing Society and The Authors’ Licensing and Collecting Society to the Wellcome Trust [21]. Given these considerations, a public sector body should not be offering diligent searches.

For a limited time period, diligent searches could be valid for other users of orphan works [consultation question 15]. This is in line with current EU proposals and means that multiple users could benefit from diligent searches. This would be time limited as new information and methods of search become

available over time, and the body would have to establish, with input from the content sectors, the appropriate timelines for each type of content and use.

Orphan works permissions would probably last for a maximum five year period [consultation question 21], and could be determined in relation to other metrics such as a print run, and in exchange for a fee levied by the authorising body. Defining a limited term is intended to allow users business certainty, without which many would not feel able to use the scheme [14]. The full fee would be reimbursed to the rightful owner should they re-appear. Should the rightful owner not re-appear within say, six years of a permission being issued, the deposited fee would be treated as a *Bona Vacantia* case (where assets have no owner [11]) and would thus default to the Crown. This coincides with the practice under the Canadian law, where collecting societies holding orphan work payments were required to hold the fees for a period of five years [16]. The Crown could then use these funds in a variety of ways such as: for cultural uses, possibly returning these to cultural bodies for preservation purposes where public funds were used to pay them in the first place; supporting the operation of the authorising body (reducing user fees); or distributing the funds to right holders. the fees for a period of five years [16]. The registry could then use these funds for cultural uses, possibly returning these to cultural bodies for preservation

Permissions granted in the UK will be non-exclusive. This is in line with solutions in other countries, and ensures that the original rights holders maintain the ability to exploit their own work, even if it has been authorised for use through an orphan scheme in their absence.

Much of the regulatory detail will need to be drafted over the summer, but the above principles should create a system which avoids the major issues found in other systems, and ensure that returning right-holders can collect revenue easily. There is no intention to exclude any content from being potentially orphan, but as the Government will set out separately, certain types of content may not be included at the outset. Given the prior requirements to be able to use orphan works, only those wishing to use genuine and probably unique orphan works are likely to do so. Provided a proper diligent search has been conducted, which measures will ensure, the number of returning right-holders is likely to be small.

- Monetised costs and benefits

The main benefits of this proposal is the value to archives from using orphan works (£2m-£76m p.a.); the value of using works which are searched because of the orphan works system incentivising effect and finding right-holders (£29m-£46m p.a.); a net benefit to museums from being able to display more of their current holdings (£1m-£7m p.a. on average); and an indirect benefit to growth and business creation from commercialising this type of content (£13m-£91m p.a. on average), which is not included for One-In One-Out calculations (OIOO), as OIOO only counts direct benefits and costs to business.

The main costs of this proposal are the public expenditure of setting up the authorising body (£2.5m-£10m); running the body itself (£0.5m-£1.8m p.a.); and the private sector costs of undertaking diligent searches as archives are incentivised to search their collections, but this would be voluntary and only done if archives believe it worth the effort (£31m-£122m p.a.). The best estimates suggest an average £76m per annum in direct business costs, and an average £78m p.a. in total costs when counting Government expenditure:

Best estimates of total costs and benefits, £m (nominal)

	Y ₀	Y ₁	Y ₂	Y ₃	Y ₄	Y ₅	Y ₆	Y ₇	Y ₈	Y ₉	Average
Direct Costs	76	76	76	76	76	76	76	76	76	76	76
Direct Benefits:	77	78	78	79	80	81	81	82	83	84	80
Total Cost:	81	81	77	77	77	77	77	77	77	77	78
Total Benefits:	77	86	96	105	117	133	148	164	179	194	130

Summary tables which break down the direct costs and benefits are available on page 13 after their full description, while a table of the total costs and benefits break-downs are on page 18.

Cost of creating an authorising body, £2.5m-£10m transition cost

Creating an orphan works authorising body will carry some transition costs. The consultation impact assessment noted that a partial comparator could be the US Copyright Office, which registers copyrighted works. Creating an institution similar to the US Copyright Office in structure might involve a transition cost of £10m in setup fees, lost administrative time and hiring costs. Several respondents to the consultation noted that these costs seemed high. In their submission the Publishers Licensing

Society [13] explained that a database of orphaned work within text based works could be established for less than £250,000.

On the basis of this, they argue, it seems improbable that the total cost would exceed £2.5m if the collecting societies in each area were to establish a database each for orphan works - avoiding duplication between those representing their own category. This figure was reached by reference to the list of 12 societies in the IPO's Impact Assessment on Codes of Conduct [17], defining nine content sectors which would lead to nine registries at £250,000 each, and a total cost of £2.25m.

This is estimate based on just establishing a register – not all the cost of determining whether bodies can use orphan works – meaning the regulatory part of an authorising body's function. Also, it assumes a very good coverage of the field, which will not apply as societies currently do not, and cannot, cover unpublished content like diaries and photos or self-publishing (an increasing trend).

Taking a somewhat cautious approach to this costing, as there is no precedent for creating this exact form of authorising body, a centralised organisation would need to gather all these databases into a single system so we take the £2.5m as a lower bound costing. We agree with the multiple submissions that the range from £5-£20m in the consultation IA was overly pessimistic and take the previous best estimate of £10m as our high cost estimate. The new best estimate is then the straight average of the two, £6.75m. Being a public initiative we would expect the transition to take two years.

Cost of running authorising body, £0.5m - £1.8m p.a.

In the consultation Impact Assessment it was not clear what type of registry would be proposed and therefore running costs were compared to the U.S. Copyright Office [8], scaled down for the size of the UK economy with a 25% error margin. This gave an annual cost of £2m - £3.3m.

Given the Government's intention to manage the authorising body, collect fees for the use of those works and then ensure search quality through a standard quality assurance method, the intended operations seem more akin to UK collecting societies than the US copyright office. Collecting societies manage a repertoire, collect fees and look for right-holders by sampling or systematically checking their databases, whereas the US copyright office runs a straight registration system with a policy department.

As such, the orphan works registry costs would be more similar to a small or medium size collecting society in its cost structure. Following the cost overview in the IPO impact assessment on Codes of Conduct [17] (with corrected figures for PPL as pointed out in the PPL submission to the copyright consultation [18]), the costs of societies collecting less than £10m per annum, ranges from half a million pounds to £1.8m [17]. We take these as the expected range of costs, with the best estimate as the average £1.15m

Cost of diligent search for users of orphan works, £31m - £122m p.a.

Legislation allowing the use of orphan works would require the carrying out of a diligent search for the (right-holders and/or creators). We envisage that such searches would be carried out by the applicants, according to sector-specific guidelines, set by the authorising body with input from the sector. The authorising body would require details of searched databases and methods with each orphan work registration. The search would need to be compatible with the requirements of any European Union standards, which are likely to be based around those set in the European Digital Libraries recommendations [5]. As a result of the orphan works system, a number of organisations would acquire orphan works permissions to digitize archives and also make further use of current collections. This would be a change in business as usual.

Therefore we need an estimate of how many items are likely to be searched if an orphan works system was set up. In the consultation impact assessment the IPO drew heavily on the available information about the BBC and British Library archives. These were some of the few data points available for estimating the size of archives and proportion of orphans. In their responses to the consultation, the BBC and British Library did not object to our estimates, and each added further detail as to its holdings on material, with the caveat that these are approximations based on length of shelf space and volume holdings [23]. We furthermore received many submissions from other archives who want to use an orphan works system, beyond the interest expressed by the BBC and British Library.

Media	Archive	Total collection size
TV & Radio	BBC	950,000
Photos	BBC	5,000,000
Sundry items	BBC	2,000,000
Newspapers	British Library	112,500,000
Books	British Library	14,000,000
Sundry items	British Library	18,500,000

We aim to estimate the cost of conducting diligent searches in these types of archives, which are amongst the largest in the UK, where the holders are keen to use orphan works. To get an hourly cost of labour we use the UK Annual Survey of Hours and Earnings (2010) median hourly pay for Librarians (£12.57 p/h) and Archivists and Curators (£12.76 p/h). The mean earnings are higher, at £14.04 and £14.58 so our cost estimates could be considered conservative.

To establish the cost of searching books we use the 2006 Carnegie Mellon University Library's pilot project, and submission (#537) to the US Orphan Works Report [9, page 36], which estimates that it costs \$78 per item in 2006, plus \$132 in legal and supporting costs, making it \$200 per item. Converting into pounds for 2006 this is equivalent to £43 at the lowest cost and £115 for the highest cost per item, using an exchange rate of 0.55 [34]. Controlling for inflation the 2010 price would be £47 and £126, which we do to make the figures comparable to the ASHE figures from 2010, using the Bank of England's GDP deflator.

We then need to establish how long it takes to undertake diligent searches for different types of content.

TV & Radio: The BBC's rights clearance trial found that checking 1,000 hours of factual programming (which is less complex than drama or comedy programmes) for rights implications, cost them 6,500 person hours [1]. Given this, we estimate that clearing television footage and radio material takes 6.5 hours per hour of material, so to clear the BBC archive of TV and Radio would take 6.1m hours ([600,000 hours of TV + 350,000 hours of radio] × 6.5 hours to clear). The Federation of Commercial Audio Visual Libraries, FOCAL, pointed out that much of this time was spent clearing rights rather than searching for right-holders, as older contracts did not have sufficient permissions for current needs [26]. The 6.5 hours could therefore be considered an upper bound, and we assume that half the time was spent clearing identified rights, so reduce the figure by 50%, to 3.25 hours, to get a lower bound estimate of 3.1m hours ([600,000 hours of TV + 350,000 hours of radio] × 3.25 hours).

Photos: We assume that each of the BBC's five million still photographs take 3.5 hours to clear as we do not have comparable data on the cost of clearing photographs. We do know that the Wellcome Library's digitisation project cleared the rights for posters, which should be simpler than photographs as they are usually signed, and this cost an average €50 (£43) per poster, which is similar to 3.5 hours of archivists working time cost in the UK (at £12.76 per hour, this is £44). Similarly, the Imperial War Museum takes on average half a day, or 3 ¾ hours (in a 7.5 hour work day) to search an artwork in their collection [25], and the suggestion in other archive submissions was that 3.5 hours was an appropriate estimate. That means it would take 17.5m hours to clear the photo archive. (5,000,000 photos × 3.5 hours)

Sundry content: We assume that the BBC's other content takes one hour at the low estimate for each of the approximately two million items, but 3.5 hours at the high, as sundry items would include various artworks, music scores, and other material. This gives a range from 2m to 7m hours to clear. Similarly for the British Library's sundry 18.5m pieces of sundry content the range would be 18.5m to 64.8m hours.

Newspapers: For the British Library holdings of 150m items we assumed in the previous impact assessment that 75 per cent of the orphans were newspapers, and the British Library did not disagree with this rough estimate. It is worth noting that the newspaper figure is not the number of titles as suggested in one criticism of the figures, but the number of issues from all titles. This is important, as the Chartered Institute of Journalists pointed out, because it was only with the 1988 copyright Act that publishers obtained full copyright in material produced by all their employees, unlike the 1911 and 1956 Acts. Therefore it is potentially not just newspaper issues but individual stories that can be orphans, and according to the Institute "based on limited sampling, the number of works involved appears to run into hundreds of thousands, perhaps millions, of immense value. This is because so many items were published in newspapers or magazines without attribution, and only limited records were retained" [24].

Given this, we retain the total newspaper figure in calculating the potential cost of searching the archives:

Books: The British Library provided a figure of 14m monographs in the archive as part of their response to the consultation, which we have included, and then we have treated the remainder of the collection (18.5m items) as sundry items, with clearance time equivalent to the BBC content [29]. In a 2009 digitisation project at the British Library it took them 235 man hours to search the rights for 60 titles alone. This suggests an average time of between three and a half and four hours per issue ($235 / 60 = 3.91$).

The table below provides an overview of the total cost from fully searching both the BBC and British Library archives, which makes it a total expenditure of between £6.1bn and £7.3bn.

The cost of searching the full archive					
Archive	Content	Hours to clear	Quantity	Cost	Total cost
BBC	TV & Radio, low est.	3¼	950,000	£12.76 p/h	£39,397,000
BBC	TV & Radio, high est.	6.5	950,000	£12.76 p/h	£78,793,000
BBC	Still photos	3.5	5,000,000	£12.76 p/h	£223,300,000
BBC	Sundry items, low est.	1.0	2,000,000	£12.76 p/h	£25,520,000
BBC	Sundry items, high est.	3.5	2,000,000	£12.76 p/h	£89,300,000
BL	Newspapers	3.5	112,500,000	£12.57 p/h	£4,949,437,500
BL	Books low est.	-	14,000,000	£47 p/item	£658,000,000
BL	Books, high est.	-	14,000,000	£126 p/item	£1,764,000,000
BL	Sundry items, low est.	1	18,500,000	£12.57 p/h	£232,545,000
BL	Sundry items, high est.	3.5	18,500,000	£12.57 p/h	£813,907,500

Given an orphan works system the BBC and British Library would engage in clearing more of their archives, as they could make use of the orphans through the permission system. We do not presume that such a project would happen immediately, nor that it would cover the entire archive, as only parts of it will contain suspected orphans. So we maintain the assumption that between 5% and 10% of the available content in the BBC and British Library would be cleared over a ten year period. The total cost of this would be between £30m and £73m per annum over ten years ($[0.05 \times £6.1bn] / 10 \text{ years} \mid [0.10 \times £7.3bn] / 10 \text{ years}$). The best estimate being the average of the two £52m p.a.

As has been pointed out in a number of responses, such costs seem high for two organisations that are far from typical even if they intend to make use of an orphan works system. This is a fair point, which is why we do not use these costs and scale up for the 2,500 museums, 3,393 public libraries, 3,000 community archives, 979 academic libraries and approximately 3,500 trust archives which might seek to use an orphan works scheme [27]. Instead we use our established archive holding figures for the BBC and British Library as a proxy for expected total UK activity. Fortunately, as part of the consultation, other institutions have provided information about their collections and an initial estimate of their suspected orphan work holdings. We can use this to test if our cost figures are in the appropriate range. The below table summarises the majority of estimates provided by archive holders, and the percentage of each collection they consider potentially orphan.

This is probably the most complete list of orphan work estimates that have been collected, even compared to the EU Commission's research [9]. These are sorted by rough categories which correspond to artwork, sound recordings, films, photographs, written material and mixed holdings but this is not exhaustive.

Media	Archive (source, if different)	Total collection size	Orphans
Art	Imperial War Museum	48,000 works	20%
Paintings	Guildhall Art Gallery (LMA)	-	20%
Prints / drawings	London Metropolitan Archive	-	25%
Artwork	National History Museum, London	500,000 items	25%
Sound recording	Imperial War Museum	33,000 records	5%-10%
Sound recording	British Library	700,000 hours	-
Film	UK film archives (FOCAL)	17,000,000 hrs	0.5% for most
Film	Imperial War Museum (FOCAL)	-	0.25%
Film (Europe)	European Film Archives [9, page 25]	3,200,000 titles	4%-7%
Archive Film	Imperial War Museum	230,000 items	5%
Archive Film	British Film Institute	-	10%
Archive Film	National Library of Scotland	32,500 items	20%
Archive Film	Huntley Film Archives (FOCAL)	80,000 titles	20%
Archive Film	London Metropolitan Archive	-	35%
Digital Photos	Getty	33,000,000 items	-
Physical photos	Getty	70,000,000 items	-
Photo libraries	British Association of Picture Libraries and Agencies	-	~0%-5% "non-issue"
'New deal' photo	London Metropolitan Archive	260,000	5%-40%
Archive Photos	London Metropolitan Archive	-	15%
Archive Photos	Imperial War Museum	11,000,000	20%
Archive Photos	UK Museum collections [9, page 29]	19,000,000	90%
Archive Photos	National Archive sample [9, page 30]	85,000	95%
Books	Authors Licensing & Collecting Society (PwC)	-	<4.7%
Documents	Bedfordshire and Luton Archives Services	-	15%
Books	National History Museum, London	1,000,000	20%
Books	National Library of Scotland	1,500,000 items	~25%
Documents	Imperial War Museum	7,900,000 items	20%-25%
Manuscripts	National Library of Scotland	-	20%-30%
Books	British Library sample [10]	-	31%
Books in copyright	British Library sample [10]	-	43%
Manuscripts	National History Museum, London	1,304 metres / 195m ³	50%
Texts	Oxford University	600,000 items	100%
Photos, reports, plans, drawings	English Heritage	12,000,000 items	8%
Overall collection	London Metropolitan Archive	-	15%-20%
Text & drawings	Museum of Childhood (NMDC)	-	15%-20%
Text, photos, maps, plans	National Records of Scotland	80km shelf space	~15%-50%
Text, photos, illustrations etc	National Archive	11,000,000 cat. Items ~180km shelf space	40%
Records / Photos	Southampton City Council	-	30%-50%
Collection on industrial heritage	Leicester University	-	60%
Testimonials	Imperial War Museum	8,000 reels	100%

These figures suggest that there are many organisations that hold potential orphans. These could benefit from a diligent search and the certainty of a permission to use orphans, or agreeing licensing terms with right-holders where such are found. The data, while indicative, compares well to the orphan work estimates in a 2009 JISC report [6] and suggest that different sectors and content have different needs.

Media category	UK sample holdings	Orphan range
Artwork	548,000	20%-25%
Sound Recording (hrs)*	750,000	5%-10%
Commercial film (hrs)**	21,800,000	0%-7%
Archive Films (hrs)	513,000	5%-35%
Photo libraries	>100,000,000	~0%
Archive photos	28,280,000	5%-90%
Written material†	10,400,000	4%-30%
Mixed collections‡	38,000,000	8%-40%

*Scaling the average IWM record to 90 minutes, or one standard cassette tape
**Treating an average film as 1.5hrs long, and including both UK and European film archives
†not counting the 600,000 orphan texts at Oxford and the 195m³ material at the national history museum.
‡Treating the average work at the National Archive & National Records Scotland as a 1cm wide holding.

Picture libraries and commercial film archives do not seem to have a pressing orphan work problem, unlike historical archives of photos and films, while sound recordings are not perhaps widely held – or at least not well represented in submissions. Given this, and other variations, it will be incumbent on the authorising body to consider whether such content should be considered as part of an orphan works system at the outset, or if such content should be phased in. The regulations of the body – to be drafted this summer – would need to set out when types of content would be part of the orphan works system.

Using the BBC and British Library costs and clearance times makes the total cost of searching between £2.3bn and £4.8bn. That excludes the commercial film archives and photo libraries as their perception of having few orphan works would probably not incentivise them to search archives. This makes it £11m-£48m per annum to clear 5%-10% of the archives over ten years [28], which compares well to the previous estimated range from £30m to £73m p.a..

This is indicative of the potential scale of the orphan works problem, and we add the high figure to our high estimate (£122m), but retain the low estimate from the original BBC-British Library cost (£31m) to reflect the fact that a new system may take longer for some organisations to participate in. The best estimate is the average of the two, £76m p.a.

Benefit to Archives and the public from content that is orphan but usable, £2m - £76m p.a.

Currently, the majority of archives would not undertake large diligent search projects because too much of their time will be wasted when works turn out to be orphans and therefore unusable. This is why the Orphan Works solution would mean a change to business practice, as archives would be incentivised to clear their holdings.

While the public will benefit from accessing these works and the archives may extract additional value from cleared orphans, our estimate of the benefits is based only on the cost of clearance, not any additional gain. We do this partly because the costs can be estimated with some degree of certainty, while potential benefits to the public and archives would be speculative. As participation is voluntary, an archive would not attempt to clear content where it did not believe the value of that activity to at least cover the costs. As we cannot, with any certainty, predict the value of the orphan works beyond this business decision, we use the costs as our benchmark benefit to archives.

We add the BBC and British Library holdings to the archives who responded to the consultation to get an indication of how much material archives who are interested in orphan works could find in any given year, if institutions aim to clear 5% - 10% of their collection over a decade.

Media category	UK sample holdings	BBC & BL	Orphan range	Orphans found p.a.	
				Low	High
Artwork	548,000	-	20%-25%	548	1,370
Sound Recording	750,000	350,000	5%-10%	275	1,100
Archive Films	513,000	600,000	5%-35%	278	3,896
Archive photos	28,280,000	5,000,000	5%-90%	8,320	299,520
Written material	10,400,000	14,000,000	4%-30%	27,380	410,700
Newspapers*	-	112,500,000	4%-95%	22,500	1,068,750
Mixed collections	38,000,000	20,500,000	8%-40%	23,400	234,000
Low calculation: (total holding × 5% × low orphan %) /10 years High calculation: (total holding × 10% × high orphan %) /10 *we keep the low newspaper percentage equal to books, and the high equal to the British Library's suggestion of the estimated number of orphans in the newspaper collection [9, page 22, 36, 38]					

Given these figures we calculate the benefit to orphan works users as being at least as much as the cost of the search. This yields an expected benefit of between £2m and £76m per annum, with the best estimate being the average of the two, £39m [30].

These are just the cost-based figures however, and it should be borne in mind that additional commercial opportunities can arise from permissions to use orphan works. For example, the British Film Institute estimates that, if it were enabled to use orphan works, it might generate an additional annual gross income for itself of more than £500,000 [1, page 39]. Similarly, the Bridgeman Art Library recorded its experience in 2004 of receiving 300 requests for orphaned images which it would have licensed for between €145 and €583 per picture, which would have been potential additional earnings of €43-€175,000 [35]. So there are additional un-quantified benefits to users of the orphan works system.

Benefit from finding works that are not orphans, £29m - £46m p.a.

During the consultation it was pointed out that because archive holders would be incentivised to undertake diligent searches, they would not just benefit from the found orphans, but also from the content for which they discovered right-holders. The system would incentivise archives to try and use more content and where they find right-holders that use would be simple to undertake.

In the absence of an orphan works system, the archives will have less incentive to undertake the search and so not realise the value of these works. This value should be the inverse of the value from orphan works, as it represents those works not orphaned. Basing this value on the cost of search (£31m-£122m) and the value of discovered orphans (£2m-£46m) the remainder should mathematically represent the value of finding non-orphans at cost basis. This gives a range from £29m to £46m with a best estimate of £37m, which is the difference between the total cost and benefit from orphan works best estimate.

As with the benefit to finding orphans, there will be potentially larger gains to both archives and also right-holders where archives seek licences to exploit works through collecting societies or with right-holders directly. These benefits are not quantifiable, but would be positive.

Possible cost through increasing supply and thereby possibly decreasing price of existing works, neutral

We have consulted on whether the use of individual orphan works is likely to have an effect on prices in certain sectors, such as photography and conducted further research. It has become clear that the greatest need for a means to enable the use of orphan works is where the works are not substitutable, such as unique shots of a historical event. Therefore, the authorising body should focus on these types of work and minimise the risk of affecting prices of known works or commissioned works. In most cases the value of the work is its uniqueness and therefore it is unlikely that it is substitutable by known works or commissioning new work.

Impact of fees on the user and market, neutral

The issue of finding both orphans and right-holders raises the issue of how the authorising body should structure its fee schedule. Following consultation there has been broad support for the Government's intention that orphan works would be offered on an equal footing to content with known right-holders.

The regulations for the authorising body will need to be drafted in such a manner that fees do not favour orphans, has a simple structure, and reflects market conditions in different sectors.

This suggests a tiered fee system, where collecting society tariffs for established uses of content sets a benchmark price for using an orphan work in those ways. There is possibly a role for collecting societies to partner with the authorising body in that instance, but this will need to be considered in the regulations. Other arrangements would be needed for other types of works and uses.

More specifically, the price of getting permissions should have a neutral impact on users of orphan works, as they would not register works if the benefit to them is lower than the cost of registration. Right-holders will be entitled to the full fee if they re-appear to claim them, which should facilitate a transfer payment either to right-holders or the authorising body, so the net effect should be neutral.

For post-implementation review purposes it will be useful to consider the actually registered orphans against the predicted number of orphans and understand if the price of registration has impacted the decision to get permissions.

Net benefit to museums and trusts, £ 1m - £ 7m p.a. on average

The Collections Trust estimates that UK museums and trusts contribute around £1.2 billion to the UK economy each year through their exhibitions and cultural activities. If 5-10 per cent of UK museum collections are orphan [6, page 6], and therefore not used, adding them to the economic contribution of the exhibitions could potentially add more value to the museum, trusts and the visitor experience. We assume the value of orphans is equal to that of non-orphans in the museums and trusts sector, meaning they could add between £50m and £130m p.a. (low: $[\pounds 1.2\text{bn}/95] \times 5 = \pounds 50\text{m}$, i.e. the current £1.2bn value reflects 95% of the collection and we want to know how much 5% would be worth; high: $[\pounds 1.2\text{bn}/90] \times 10 = \pounds 130\text{m}$).

Following consultation, and in particular discussion with the author of the report on the scope of orphan works [6], who has undertaken a survey to estimate the incidence of orphan works in museums, it has been suggested that the value of orphans was uneven. But it was argued that highly valuable content was unused. Not wanting to over-estimate the potential contribution of orphan works in this impact assessment, we do not presume that orphans are more valuable, but this is an indication that our figure may be an under-estimate of the benefits.

On the benefits, we assume – as for all our archive figures – that 5%-10% of holdings would be cleared over a ten year period. That provides a rough indicator that between £2.5m (5% × £50m) and £13.0m (10% × £130m) of additional value would be released in the tenth year. As holdings are gradually cleared over ten years, more aggregate value would be added, so in year zero the minimum would be a tenth of £2.5m but next year it would be two tenths until nine years, when the whole benefit is realised.

£m	Y ₀	Y ₁	Y ₂	Y ₃	Y ₄	Y ₅	Y ₆	Y ₇	Y ₈	Y ₉	Average
Minimum	0.25	0.50	0.75	1.00	1.25	1.50	1.75	2.00	2.25	2.50	1.4
Best estimate	0.78	1.55	2.33	3.10	3.88	4.65	5.43	6.20	6.98	7.75	4.3
Maximum	1.30	2.60	3.90	5.20	6.50	7.80	9.10	10.40	11.70	13.00	7.2

Summary of Direct costs and benefits for One-In One-Out (OIOO) purposes

The figures above which relate to private business are used for calculating the direct costs and benefits and are included in the OIOO calculation, as discussed in the Government's guidance on OIOO methodology [42]. Government costs are not included in these calculations. A brief summary of the best estimates are provided in the two tables below:

£m	Y ₀	Y ₁	Y ₂	Y ₃	Y ₄	Y ₅	Y ₆	Y ₇	Y ₈	Y ₉	Ave.
Cost of new diligent searches	76.0	76.0	76.0	76.0	76.0	76.0	76.0	76.0	76.0	76.0	76.0
Direct Costs	76.0	76.0	76.0	76.0	76.0	76.0	76.0	76.0	76.0	76.0	76.0

Using orphans	39.0	39.0	39.0	39.0	39.0	39.0	39.0	39.0	39.0	39.0	39.0
Re-discovered non-orphans	37.0	37.0	37.0	37.0	37.0	37.0	37.0	37.0	37.0	37.0	37.0
museums and trusts	0.8	1.6	2.3	3.1	3.9	4.7	5.4	6.2	7.0	7.8	4.3
Direct Benefits	76.8	77.6	78.3	79.1	79.9	80.7	81.4	82.2	83.0	83.8	80.3

Benefit to growth and business creation, not quantified for OIOO purposes

In addition to the direct reduction in costs of clearance through orphan works reform, we expect significant benefits to growth and innovation from the availability of very large amounts of historic orphan content in UK archives. While there are firms in this market, and organisations such as the BBC, British Library, National Archive, British Film Institute and Bridgeman Art Library who already want to digitise collections for use, we treat this as an *indirect* benefit for the purposes of One-In One-Out (OIOO) calculations; as the commercial firms in this space do not yet exist, or have not yet decided to work with UK archives, due to the orphan works problem.

Direct benefits are the reductions in cost which we expect to see in rights clearing for organisations which have large archive and historic collections, for which this IA gives the most comprehensive account yet assembled. These cost reductions are included in the OIOO assessment.

Indirect benefits come through the innovation and growth which releasing these collections will allow. Some of the market value will be realised by the collection owners, but much will be created by new products and services, by new and existing firms, as they have in the US. These indirect benefits cannot be counted under OIOO, but they are an important part of the economic value of the policy change. They therefore appear in the calculation of overall benefits to the economy.

At present the time required to undertake diligent searches of complex content can prevent new technology opportunities being exploited. The BBC, one of the largest holders of historic content in the world, made this clear in its submission to the Hargreaves review:

"The existing copyright framework poses challenges for BBCW as it can be difficult to clear all the rights in sufficient time to facilitate a deal. In the digital age 'speed to market' is critical to maximise returns and often with new types of technology there is only a limited window of time to leverage the best deals. However the complexity of the clearing rights for commercial purposes has sometimes previously prevented BBCW from pursuing commercial opportunities. For example, BBCW lost out on a lucrative deal several years ago involving making classic comedy clips available on mobile phones at a time when delivery of content to mobile phones was in its infancy."

Orphan works would only have been one of the issues in this case. However in discussions with BBC Archives, and in the BBC submission, it has been suggested that orphan material can be a much greater problem in older material. The BBC has one of the largest audio visual and written history archives in the world, some of which is too costly to clear and make available to the public. In its submission BBC says "It is not always possible to trace underlying rights holders for orphan works for a number of reasons.

- The existence of underlying rights may not always be clear e.g. we cannot always determine whether presenters of a show wrote their own scripts or simply voiced a script written by someone else. While performance contributions are currently protected by copyright for a period of 50 years, there may be other elements (e.g. pre-written script/literary content) protected by copyright for a longer term of lifetime + 70 years. In many cases these elements were not identified in early programmes or programme listings. It is therefore impossible to know if there are contributions within the period of copyright protection or not.
- It is not always possible to identify or to contact the rights holder. This happens, for example, in the case of anonymous contributions, or where it is not possible to determine who has inherited rights upon the death of a rights holder."

BBC policy is to make available as much as possible of its archive to the public. It is also interested in creating commercial value through its assets, which would include the use of archive material for personal history services, for which there is growing demand - spurred by and reflected in the audiences for family history TV programmes (e.g. "Who do you think you are", which attracts 6 million viewers and has been adapted as a format in ten other countries)

Genealogy as a proxy for the orphan works issue

There is no comparable regulatory change for orphan works elsewhere in the world, as other systems have focussed on individual clearance models. Therefore we use a close proxy where we can isolate an instance where previously unavailable older content has become available through a regulatory instance. In the UK, a close analogy is the release of census data under the 100-year-confidentiality-rule, where analogue content made available – and have been digitised by UK firms. In the US there is no copyright on Government created content, so a much broader portfolio of works (which are orphans in the UK) can be digitized and used. Both of these examples relate to the growing genealogy industry, where old photographs, documents, census information and other material is brought together by new providers to deliver new services. The genealogy sector is therefore a good proxy for what would happen under an orphan works system, as it has used content that behaved like orphans would – with the release of the 1911 census – and has made use of content that overcame the orphan problem – given the US law that does not grant copyright status for government works.

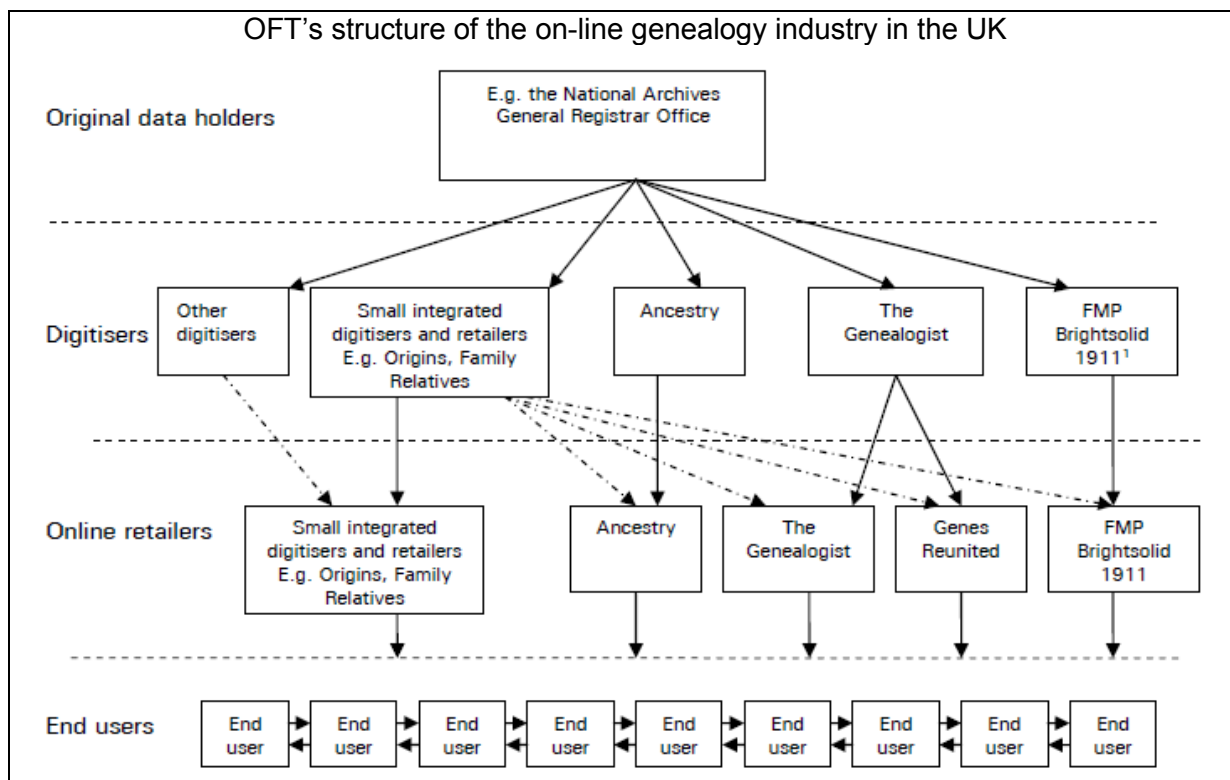
In the UK, there is an active and growing market for genealogy, and one firm has addressed an orphan-like problem in this space: BrightSolid Ltd. digitised the 1911 UK Census – starting in 2007 – in collaboration with the National Archive. Its revenues from both digitisation and making the census material available through genealogical site led to gross profits of £6m in 2010, and merging with Friends Re-united later, raised the gross profits to £13.4m in 2011 [39]. This illustrates how content that is made available can generate value in the UK, and the Office for Fair Trading (OFT) merger decision on Brightsolid outlined how the release by the national archive encouraged multiple firms in different layers of the value chain [40]:

The US orphan „solution’ has allowed the creation and growth of a number of large internet based businesses, an content has been made available by commercial firms partnering with archives and digitising content, the equivalent of which is currently orphan in the UK. This type of business has historically been a 'cottage industry' of small specialists, but has become big revenue generators with millions of customers.

The largest US firm in this business (Ancestry.com) is capitalised on NASDAQ for over one billion dollars. Launched in 1998, Ancestry.com grew its sales to \$62 million in 2002 and to \$400 million in 2011, with a gross profit of \$333 million that year [36]. This growth has occurred partly by acquisition of other data sources, which together offer new information and linking services based on census and other data which has been made available.

Archives.com, was launched in July 2009 and digitised 2.1 billion photos, newspapers and Government records, and then worked with the US national archive to digitize the US 1940 census – whereas the UK National Archives who wish to partner and utilize their collection, are prohibited by the risk posed from 40% of the collection which is estimated to be orphaned. By 2011 Archives.com had 380,000 subscribers who paid \$39.95 per annum for a subscription to their services, at annual revenues approximating \$15m. In 2012 they were acquired for \$100m, and integrated into Ancestry.com, reflecting the value that private providers can realise in utilizing orphaned work, and the value proposition to consumers [37].

Similarly, launched with five million items in 2005, Footnote.com (now fold3.com) provides access to digitized military records, military photos and other armed forces information. Something not possible in the UK due to orphan works issues, as reported by the Imperial War Museum and V&A. By 2009 Footnote.com had 35,000 subscribers paying annual subscriptions of \$79.95, approximating annual revenues of \$2.8m and was sold for \$27m in 2010 [38].



Freeing up historic archives, at national and local level, from the UK's collections (including the major contribution available from the BBC) without the constraints and risks of orphan content would allow the creation of value added services in personal and family history, but also in other areas. This is of course only a portion of what an orphan works system would permit, but it is the area in where we have comparable data from the US market, as this activity has been made possible under the copyright law for content created by the public sector.

The lower bound estimate – a UK comparator

We know there is a market for genealogy in the UK, as suggested by the 11 million subscribers to the UK's Genes Reunited, and the estimates by OFT of a £50-£60 million market in social networking and genealogy [40]. We expect the additional photos, documents, census, and other material would produce value in that market, and the low estimate builds on BrightSolid's gross profits in the period from 2007 to 2011, for digitising and using the 1911 UK census. We have data for 2007, 2010 and 2011 (underlined below), and interpolate the missing values:

£m	2007	2008	2009	2010	2011
BrightSolid Ltd.	<u>0</u>	2	4	<u>6</u>	<u>13</u>

Using this we estimate a minimum value to the UK market in genealogy as rising to £13m over five years, and to be conservative, we fix that value for the remaining time period.

£m	Y ₀	Y ₁	Y ₂	Y ₃	Y ₄	Y ₅	Y ₆	Y ₇	Y ₈	Y ₉	Average
Minimum	0	4	9	13	18	18	18	18	18	18	13

The higher bound estimate – an International comparator

To get a maximum value, we focus on the market leader in the US industry that has been created around digitising and using content for the genealogical sector. The suggestion here is that new products and services in the whole UK market would be at least as valuable as those created by the US market leader, using only public sector material – which UK firms would not be limited to. We have data from three US firms which by 2012 were part of Ancestry.com and who provided a mix of digitisation and retail

functions using content that could be cleared under an orphan works system in the UK. Looking at the revenue figures over the last 10 years provides a guide to how this market would evolve.

\$m revenue	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011
Ancestry.com	<u>62</u>	85	108	131	155	178	201	<u>224</u>	<u>300</u>	<u>400</u>
Footnote.com	-	-	-	<u>0</u>	0.7	1.4	2.1	<u>2.8</u>	*	*
Archives.com	-	-	-	-	-	-	-	<u>0</u>	7.5	<u>15</u>
Sum	62	85	108	131	156	179	203	227	308	415

Source [35, 37, 38, 41], *acquired by Ancestry.com ; -not yet operating ; underlined is real data, others interpolated

To estimate the impact on the economy we are interested in the gross profits of the company, not revenues. From Ancestry.com's annual accounts [a] we can estimate that gross profits were on average 81% of revenues between 2009 and 2011 (gross profits: 2009 \$178m, 2010 \$248m, 2011 \$333m). Using exchange rates from the reporting date of the firm we can then convert the above dollar revenues, to pound sterling equivalent gross profits.

	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011
\$m revenue	62	103	123	144	164	186	207	232	315	400
Gross Profit %	81%	81%	81%	81%	81%	81%	81%	81%	81%	81%
£/\$ exchange rate	0.621	0.560	0.522	0.582	0.511	0.504	0.684	0.616	0.644	0.646
Estimated £m profit	31	47	52	68	68	76	115	116	164	209

Source: exchange rates from last trading day of the year on www.x-rates.com

For our high estimate, we take the first five years of business by Ancestry.com, which was started in 1998 and had grown to an estimated gross profit of £31m by 2002. At the time, the market, internet and digitisation technology was not as well developed, but we wish to be conservative at the outset. Also it is important to bear in mind that for an orphan works system, significant value could be found in a single work, as suggested for the museum collections [6] or the newspaper works [24], but this is probably rare. More often, as is the case in genealogy, value will be realised by combining different pieces of content to create something new, be it a documentary, book, software or some other service. As content is cleared and used, one would expect the benefits from this to increase over time, so we expect the benefits to be realised five years after implementation, as more orphan work is entered onto the registry. Following this period, our high estimate is linearly interpolated so that the whole market in the UK would approximate the returns experienced by Ancestry.com in 2011 by year ten. Given current technology and interest in this area, this seems conservative, especially given the on-going growth in this sector.

£m	Y ₀	Y ₁	Y ₂	Y ₃	Y ₄	Y ₅	Y ₆	Y ₇	Y ₈	Y ₉	Average
Maximum	0	16	31	47	62	91	121	150	180	209	91

Best estimate and OIOO

The best estimate is then the straight average of the high and low, as we do not have any data to suggest a different split.

£m	Y ₀	Y ₁	Y ₂	Y ₃	Y ₄	Y ₅	Y ₆	Y ₇	Y ₈	Y ₉	Average
Minimum	0	4	9	13	18	18	18	18	18	18	13
Best estimate	0	9	18	26	38	52	67	82	96	111	50
Maximum	0	16	31	47	62	91	121	150	180	209	91

Therefore we include the benefits in the net present value calculation for the policy, as it represents a best estimate of equivalent activity for which multiple holders of archives already wish to engage in, and where a private market exists for the output, but the orphan works issue prevents participation. We do not include this benefit in the OIOO calculations as they are not direct benefits, but indirect benefits to firms that will engage in this business. We consider there to be additional un-quantified benefits from orphan works, but can only quantify the segment for which equivalent US businesses operate in a sphere where the orphan works issue has been overcome, and similar UK business choices have been

made. We expect the additional benefits to be higher, as the much broader information held in newspapers, public documents, radio, news shows, photographs, music scores and film footage will create further markets and businesses, but cannot reliably forecast a range for these benefits.

Summary of total costs and benefits

To estimate the net present value we add indirect and Government costs and benefits to the direct costs and benefits. The below summarises these values (see [43] for NPV calculation method):

£m	Y ₀	Y ₁	Y ₂	Y ₃	Y ₄	Y ₅	Y ₆	Y ₇	Y ₈	Y ₉	Ave.
Direct Costs	76.0	76.0	76.0	76.0	76.0	76.0	76.0	76.0	76.0	76.0	76.0
Setting up registry	3.4	3.4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.7
Running O.W. registry	1.2	1.2	1.2	1.2	1.2	1.2	1.2	1.2	1.2	1.2	1.2
Total Costs	80.6	80.6	77.2	77.2	77.2	77.2	77.2	77.2	77.2	77.2	77.9
Direct Benefits	76.8	77.6	78.3	79.1	79.9	80.7	81.4	82.2	83.0	83.8	80.3
Growth and business	0.0	8.8	17.5	26.3	37.5	52.2	66.9	81.6	96.3	111.0	49.8
Total Benefits	76.8	86.4	95.8	105.4	117.4	132.9	148.3	163.8	179.3	194.8	130.1

- **Non-monetised benefits**

Benefit to current orphan work users, from more legal certainty in the UK

A number of museums and archive holders who responded to the consultation are currently using works that have been diligently searched, and have been found to be orphan. A number of them do so by making provisions for potential right-holders through a risk insurance, which a few museums referred to in their consultation responses; some set aside funds in an 'awaiting claims' account, as the BBC do. Some simply take the calculated risk that no-one will come forward and do not keep funds aside at all. Without a system of permissions, all this activity is effectively infringing copyright even though cases can and often are settled through a licensing agreement.

The orphan works system would offer permissions that cover the UK, which remove legal uncertainty as to the use of orphan works, and through its pricing system, reduce the cost for those that currently use orphan works. In 2009/10 the BBC had programme income of £8.9m subject to awaiting claims due to untraceable owners or failures to respond to clearance requests [31]. This is indicative of the size of these pools, and they represent the expected licence costs as well as the legal risk premium. The orphan works system would remove the need for a legal risk premium where content was aimed at the UK market, and would remove the need to keep money aside as it would charge fees up-front.

Institutions which do not put aside funds for their use of orphans will, with an orphan works system in place, be more exposed to discovery which should make the enforcement of rights simpler. It is not possible to quantify the total benefit of this, as it will depend on how much is currently put aside, how much content is aimed at the UK market and the legal risk assessments of each firm, all of which is commercially sensitive or confidential information which we cannot access. It is clear however that the effect should be positive. It may even reduce the legal risk for entities looking to use orphan works globally as permission in the UK could be seen as a strong argument for the orphan status of a work.

Benefit from past diligent searches

There is a potential benefit for those who have already undertaken diligent searches, and for those who undertake diligent searches as part of their daily business and had until now discarded orphan work discoveries. It will be for the authorising body to establish how recent a diligent search would have to be eligible for re-use, and this will be considered as part of their draft regulations. This is not quantifiable at this stage. If searches undertaken within a certain time-period were included, institutions would be able to register the use of an orphan work without additional costs, so there would be a benefit.

Benefit of expanded resource database for research and educational purposes

Some use of copyright content is exempt from needing a licence or explicit permission under a system of 'copyright exceptions'. These include some educational, research, reporting, review and a number of other uses. As more orphan works are identified and listed, there will be more content which is easily

findable for these uses. It is not possible to quantify this benefit, but it should provide more choice, especially for educators.

Benefit of increased lawful use of the copyright system

The Government has received comments that the ability to utilise orphan works on an authorised basis is likely to increase overall confidence in copyright per se. The situation where culturally valuable material cannot be used with permission, to the detriment of the public and the right-holder, tends to decrease respect for the copyright system as a whole, and may reduce compliance in other areas.

Furthermore, increased lawful use through the scheme would mean additional revenue being paid by currently unlawful users to relevant rights holders.

There would also be a further benefit in terms of rendering the process of civil pursuit of unauthorised sellers easier.

• **Risks and assumptions;**

Risk of actively „orphaning’ work by ripping metadata, medium

There is a justified concern particularly from photographers about the current copyright system, where their work, once digitised, is appropriated by unscrupulous content sellers, and the identifying information (metadata) is removed in order that the work can be presented as owned by the unauthorised seller. The authorising body would not prevent such abuse across the copyright system, but it would make it more difficult for a seller to explain the presence of work without metadata in a catalogue if they could show no evidence of having registered it as orphan. This should make it easier for photographers and others in this situation to pursue unauthorised users who are representing the works in their sale catalogue as orphan.

The regulations for the authorising body will need to reflect what content should be part of the initial set of allowable orphan works, and whether there is a need for commercial films and digital photography (as found in picture libraries and forms the core of most current professional and semi-professional photography). There is a case for including historical and archival photography, especially those found in physical formats, and indeed Getty Images suggested that the orphan work authorising body restrict itself to physical photos [32].

• **Wider impacts**

Extended collective licensing and orphan works

In parallel, the government intends to introduce legislative proposals for extended collective licensing. This is a form of licensing, which allows an authorised collecting society to deal with the rights of all right-holders in its sector, including those from whom it does not have a direct mandate. The only exception to this is where the rights holder opts out of an extended collective licensing arrangement. Extended collective licensing is being implemented for the broader purpose of simplifying the complex rights clearance system, but it could also be used for the mass clearance of certain types of works that may include some orphan works, for example, in large scale digitisation projects. For details on Extended Collective Licensing please see the separate Impact Assessment [4].

The relationship between the orphan works system and the potential Digital Copyright Exchange

When the orphan works system is created, there is a chance that it will be followed by a Digital Copyright Exchange (DCE) which was proposed by Hargreaves [1] and is currently being looked into by Richard Hooper [32]. In that case, it is likely that a search of the DCE would be an essential part of any diligent search, as indeed it would be necessary to search any other publicly available databases of copyright works which were not on the registry. Searching on the DCE should be cheaper than searching a variety of unconnected databases. If the DCE becomes recognised as a type of de facto default register for copyrighted works, then a search of the DCE is likely to reveal much information about rights holders if that is known. To that extent, a search of the DCE may simplify the process of identifying whether there are claimants to a particular work, simply because claimants are likely to use the DCE process.

Since the DCE would be a private sector initiative, essentially without government assistance, it is not expected that the operation would fall as a cost on the public purse. Many organisations in the private sector already claim to have laid the essential foundations of a DCE, and furthermore point to the substantial investments they have made in such projects. It must be assumed that they have done this because there is a commercial benefit in digitising the process of licence granting. It is therefore assumed that the process of taking this on to the more comprehensive system envisaged by Hargreaves is one which industry will fund.

A fully functioning DCE could therefore reduce to some extent the costs of running the orphan works registry. It could also reduce the costs of those wishing to use orphan works, who could search much more easily for content and right-holders who could monitor all their content in one place than with the present situation where there is no central registry/database. There would be no benefit from the DCE for unpublished archive material.

The wider legal and EU context

Under national and international copyright legislation, the creators of copyright works are given the exclusive right to perform certain acts in relation to their works, for example the right to copy the work and the right to communicate the work to the public [33]. Performers have rights over the recording of their performance and a mixture of exclusive rights and rights to equitable remuneration in their recorded performances. Most of these rights may be sold, transferred or inherited. Some creative works contain more than one right; for example a CD may contain copyright music, lyrics and sound recording and performers' rights. Each individual copyright may be owned by more than one person; for example, if the lyrics have been composed by two songwriters working together they will jointly own the copyright.

Anyone apart from the owner of the right who wishes to perform one of the exclusive acts (copying etc.) will need authorisation from the right-holder which may take the form of permissions or a licence. The performance of an exclusive act without the permission of the rights holder will amount to an infringement of copyright or performers' rights, unless it falls within a statutory exception.

The European Commission has recently put forward a draft Directive on Orphan Works. The draft Directive is focussed on cultural uses of certain works by a certain institutions. The UK Government is proposing a complementary scheme that would allow commercial and non-commercial use of a wider range of works and not limited to certain institutions. This is on the basis of Hargreaves's recommendation. However, the UK scheme would not have extra-territorial effect. Should the EU proposal be adopted, the UK scheme will operate alongside it.

• **Post Implementation Review plan**

A full evaluation strategy and Post Implementation Review is being developed for the introduction of the Hargreaves recommendations. The Post Implementation Review will detail the benefits associated with the introduction of the copyright reforms and will include input from external stakeholders. The plan will also set out how and when the benefits will be measured, which will depend on the type of benefit, as some benefits will be measured by applications and take-up that can be measured from the first year of operation, whereas others will depend on information that will take several years. The evaluation strategy will set out the activities that will be undertaken in order to evaluate the policy, drawing on management information collected through the copyright system, as well as research that is commissioned in order to measure the benefits.

In the case of orphan works system, this would be incorporated into the authorising body's regulations and should include, but not be restricted to:

- Number of registrations of orphan works on the system versus the predicted numbers.
- Use permissions issued by the authorising body. This should be followed up by research to test whether costs have been saved in storage for archives seeking digitisation permissions, and estimates for the commercial and non-commercial use of works on the registry.
- Number of registered entities
- Number of found owners in sample verification and instances of insufficient searching which can be improved

The aim should be to review the functioning of the orphan work system one year after it is fully functional, which may be appropriate in 2015. At that stage the authorising body should establish whether the system is being used to its full potential, and if not, how it can be improved for right-holders who return and users.

• **Summary and preferred option with description of implementation plan.**

Based on the evidence gathered from consultation, the preferred option is to legislate to permit the use of orphan works. A working scheme may in time benefit from the DCE which would further reduce the costs and increase the benefits of an orphan works system.

This option has the lowest cost to both government and the private sector, provides the maximum net benefit for the economy and is technologically and legislatively achievable.

• **Direct Costs and Benefits to Business Calculations (following OIOO methodology) and Micro Exemption**

The orphan work solution would mean that holders and users of works with an unknown or un-locatable author would be effectively be exempt from the regulatory framework surrounding copyrighted works providing they have met the requirements of the scheme: so it recasts regulation in order to reduce the burden on organisations holding or wishing to use orphan works. There will be a series of safeguards around the use of orphan works but these impact businesses indirectly as they only apply when businesses choose to use the orphan work. Freelance creators should benefit from an increased probability of being reunited with any orphan works in the diligent search and, in the limited cases where they are not found at that stage but appear after the work has been licensed, they will receive licensing fees for the use and regain control of the work. Micro businesses are not excluded from the scope of this proposal because, there would be an overall benefit for them from being able to use orphan works. Consistent with the Regulatory Policy Committee opinion on the consultation stage impact assessment dated 16/11/2011 as the Business net present value is a positive £34m, and the proposals are estimated to have a negative impact on net cost to business by £3.9m per year, this is a regulatory OUT.

Many of the innovative businesses which will be able to take advantage of this change will be SMEs creating new uses for historical material. The genealogy and family history businesses are typical examples. They should not be excluded from the ability to grow and innovate using the newly available material.

The authorising body would be a public undertaking, which the IPO would fund initially and be budgeted for in the financial year following legislation being enacted. Draft regulations for the authorising body should be completed over the summer of 2012 and agreed by fall 2012. After legislation the IPO should draw up plans for creating the IT structure and space to accommodate the authorising body, both on the internet and physically, and it should be ready to launch before the end of the financial year in which it has been started.

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14	<u>Hungary</u> : Ficsor, Mihaly, 2009, "How to Deal with Orphan Works in the Digital World? An Introduction to the New Hungarian Legislation on Orphan Works", EU Commission, DG for Internal Policies, http://www.europarl.europa.eu/document/activities/cont/200911/20091113ATT64497/20091113ATT64497EN.pdf <u>Canada</u> : Under the Canadian <i>Copyright Act</i> 1985, section 77(3) says that "The owner of a copyright may, not later than five years after the expiration of a licence issued pursuant to subsection (1) in respect of the copyright, collect the royalties fixed in the licence or, in default of their payment, commence an action to recover them in a court of competent jurisdiction"
15	De Beer J. Bouchard M, 2010, "Canada's „Orphan Works' Regime: Unlocatable Copyright Owners and the Copyright Board" Vol. 10(2) <i>Oxford University Commonwealth Law Journal</i> , p. 215-56, page 37
16	This is in accordance with section 77(3) of the Canadian <i>Copyright Act</i> 1985, although the practice of holding the money has since been reduced, so the society now carries a liability but need not hold the fees in escrow.
17	IPO impact assessment on collecting society codes of conduct, BIS0313, consultation stage IA submitted 24/10/11 http://www.ipso.gov.uk/consult-ia-bis0313.pdf , page 5; Final stage IA submitted 21 May 2012. (Societies collecting less than £10m with cost figures: DACS, BECS, Directors UK and ERA)
18	PPL submission to the Copyright Consultation
19	Tom Rivers Consulting submission to the copyright consultation, quotation on page 6, British Library commentary on pages 1-3.
20	See for example the National History Museum of London's Submission to the Copyright Consultation, response to question 1.
21	Wellcome Trust submission to the Copyright Consultation, Box 1, page 3
22	Bodleian Library submission to the Copyright Consultation, page 3
23	BBC submission to the Copyright Consultation, page 5

24	Chartered Institute of Journalists submission to the Copyright Consultation, page 1					
25	Imperial War Museum submission to the Copyright Consultation, reply to question 12					
26	FOCAL International submission to the Copyright Consultation, page 9					
27	Museums and galleries: http://www.museumsassociation.org/about/frequently-asked-questions ; Public Libraries: Figure from DCMS, from Chartered Institute of Public Finance and Accountancy; Archive figures from Archives & Records Association submission to the copyright consultation; Academic Library figure (2008/09) from Bridgeman submission to the copyright consultation.					
28	Calculation: Media × UK sample × hours to clear × cost per hour = cost to search that medium.					
	Media category	UK Sample	hours to clear	cost	sum	
	Artwork	548,000	3.5	£12.76	£24,473,680	
	Sound Recording	33,000	1	£12.76	£421,080	
	Archive photos	28,280,000	3.5	£12.76	£1,262,984,800	
	Archive films, low	342,000	3.25	£12.76	£14,182,740	
	Written material, low	10,400,000	per item	£47.00	£488,800,000	
	Mixed collections, low	38,000,000	1	£12.76	£484,880,000	
	Archive Films, high	342,000	6.5	£12.76	£28,365,480	
	Written material, high	10,400,000	per item	£126.00	£1,310,400,000	
	Mixed collections, high	38,000,000	3.5	£12.76	£1,697,080,000	
29	British Library submission to the copyright consultation, page 6					
30	The cost figures are the multiplication of hours to clear and costs from footnote 28, and then the low columns and high columns are multiplied separately to get estimated lows and highs.					
	Media category	low	high	low cost (hrs * cost)	high cost (hrs * cost)	Low benefit High benefit
	Artwork	548	1,370	£44.66	£44.66	£24,474 £61,184
	Sound Recording	275	1,100	£12.76	£12.76	£3,509 £14,036
	Archive Films	278	3,896	£44.66	£82.94	£12,427 £323,093
	Archive photos	8,320	299,520	£44.66	£44.66	£371,571 £13,376,563
	Written material	27,380	410,700	47 per item	126 per item	£1,286,860 £51,748,200
	Mixed collections	23,400	234,000	£12.76	£44.66	£298,584 £10,450,440
	Sum					£1,997,425 £75,973,516
31	BBC response to the Hargreaves Review, p. 8					
32	See http://www.ipo.gov.uk/hargreaves-copyright-dce for details on the DCE proposal and progress					
33	the full list of exclusive acts is in Section 16 of the Copyright Designs and Patents Act (1988)					
34	which is the average of the exchange rate from the first (2 Jan), middle (3 Jul) and last (31 Dec) trading day in 2006, with rates from x-rates.com, 0.581801, 0.543183, 0.510569					
35	EU MILE project, 2005, Metadata and Intellectual Property Rights: Orphan Works Meeting, page 3: http://www.mileproject.eu/asset_arena/document/LG/MILE_ORPHAN_WORKS_DATABASE_MEETING_BARCELONA_LG.PDF					
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39	2010 and 2011 Annual Accounts of Brightsolid Online Innovation Limited					

40	Office of fair trading, 2009, "Anticipated acquisition by Brightsolid Group Limited of Friends Reunited Holdings Limited" OFT decision, ME/4212/09; page 4: http://www.offt.gov.uk/shared_offt/mergers_ea02/2009/Brightsolid_FriendsReunited.pdf
41	Ancestry.com annual report 2011, page 13-14, http://ir.ancestry.com/secfiling.cfm?filingID=950123-11-23066
42	HM Government, 2011, One-In One-Out (OIOO) Methodology, paragraph 32 http://www.bis.gov.uk/assets/biscore/better-regulation/docs/o/11-671-one-in-one-out-methodology
43	The Impact Assessment calculator, initially developed by the IPO, automates these calculations and is available on http://www.bis.gov.uk/ia under "IA calculator".