



# Anatomy of a Pandemic

**NHS communicators on the COVID-19 front-line**

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**A CHCR Technical Research Paper**

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## FOREWORD & ACKNOWLEDGEMENTS

The Centre for Health Communication Research (CHCR) is based at Buckinghamshire New University. It focuses on the communication challenges, issues and opportunities faced by organisations in the health sector. CHCR acts as a catalyst for innovative thinking at the boundary between academe and the public sector. It seeks to inspire the use of effective and professional communications to improve patient outcomes, strengthen patient experience and ensure the most efficient and effective delivery of health services.

This research project has been conducted as a contribution towards NHS learning arising from the international coronavirus pandemic with the support of an Advisory Group comprising:

- Daniel Reynolds, NHS Confederation
- Adam Brimelow, NHS Providers
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Finally,<sup>1</sup> we are hugely grateful to the NHS communications' community in England<sup>1</sup>. Their response to our 'call' for participation in this study was rapid, rewarding and authoritatively-senior. Nearly two-thirds of our 166 respondents are Band 8a+, 21% Band 8d or above<sup>2</sup> and over 60% leaders of their teams. This enables us to present findings that are both statistically valid<sup>3</sup> and broadly representative by both NHS region<sup>4</sup> and organisational type<sup>5</sup>.

The proposal for this research project was approved by the Buckinghamshire New University ethics panel.

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<sup>1</sup> Please note that: (i) red-notes refer to Annex 3-End-Notes; (ii) items in round brackets e.g. (2.0, 4.1) refer to another section or annex in this paper; and (iii) items in square brackets e.g. [20] to Annex 2-References.

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## 1: OVERVIEW, PURPOSE AND SUMMARY

1.1 **Purpose:** this special CHCR study investigates the communications response by *NHS Professional Communicators (A1)* in England<sup>6</sup> during the first 90 days<sup>7</sup> of the COVID-19 ('C19') *Pandemic (A7)* in first-half 2020. For communicators, it aims to:

- I. Identify and report 'best practice' *as it happened*
- II. Contribute insights that may help them manage and mitigate any second C19 'wave' and/or future pandemic both within England and internationally.

The study responds to various research calls (2.0) and generally addresses a 'what happens next in practice' question. That is, how best should (and did) NHS communicators discharge NHS England's *Emergency Preparedness, Resilience and Response Framework's (EPRR)* injunction to provide:

- "...effective communications [to] ensure that patients and the wider public are well informed about NHS service *in their local area* and what is expected of them" [6:29, author's ital].

As such, the study: *neither* investigates the EPRR framework itself e.g. its during-*Pandemic (A7)* discharge or interpretation of structure and systems guidelines provided [6] for, say, formal reporting or information transfer; *nor* governmental policy, strategy or message formulation.

Within the parameters of the 'what happens' question, the paper addresses ten topics, principally from the literature. Topic-selection reflects the 'art-of-the-

possible': a limited-time intervention opportunity within the English NHS. Exclusion does not imply less importance.

Finally, this paper complements CHCR's simultaneously published White Paper<sup>8</sup>. For those wishing to explore further detail, it serves both as the White Paper's 'technical backgrounder' and an interim contribution on the path to projected academic publication.

1.2 **Summary:** this paper's structured linear approach integrates its chosen ten topics (1.1) into one time-based narrative: the 'anatomy of a pandemic' (**Figure 1a**, for model and graphic summary of principal findings). Further, for accessibility, it adopts (loosely) a format with which all communicators will be familiar: the 'comms plan'<sup>9</sup>. **As follows:**

- I. *Situation analysis* (4.0): somewhere between first news reports from Wuhan, China (31 December 2019) and the advent of UK lockdown (11 March 2020), *NHS Professional Communicators* become aware of an impending 'crisis' of substantial proportions. Nationwide, subject to variation in 'capabilities', they are generally 'reasonably prepared'. Thanks perhaps to NHS communications' embedded crisis DNA, they exhibit 'active, continuous and anticipatory' *Crisis-Readiness ('CR')*. This CR associates positively with aspects of the following process e.g. efficiency, ability to influence and overall effectiveness. A six-item *Crisis-Readiness* scale (tested here) provides an analytical tool for future improvement.

**Next, as they cross the March 11 'line' from before- to during-Pandemic, NHS communicators adjust:**

- II. First *Priorities* (S5) i.e. select and rank communications goals. Per pandemic best practice, communicators emphasise public-information and -behaviour change. These *Priorities* associate, subsequently, with positive outcomes e.g. three-item *Public Engagement* scale (especially, its 'reassurance' item). Consequently, communicators' observed choices, and their effects, add practical insight to learning about *Outbreak Communications*.
- III. Second, *Audiences* (S6) which proves more complex than *Priorities* because in England, the NHS brand accommodates (at least) seven major organisational types. Each type's cadre of communicators, it emerges, had evolved distinct 'before' audience strategies. In turn, they make compounding divergent during-*Pandemic* adjustments. The result: an inconsistent pattern that also exposes an unresolved 'fault-line' between a 'single-message' imperative and prior best-practice community engagement and mitigation. Future resolution may improve overall effectiveness and, mitigate (e.g. among BAME groups) 'communications inequalities' that may have contributed to higher mortality rates.
- IV. Third and finally, restructure *Inputs* (S7) or 'resources'. Thus, they (a) increase available time (average

25% longer hours) and (b) redeploy to homeworking (average 63% of time). These changes, however, *neither* associate consistently with operational benefits *nor* are free from negative personal effects (further below). This rare insight into front-line impact on communicators-as-actors counsels care in future planning.

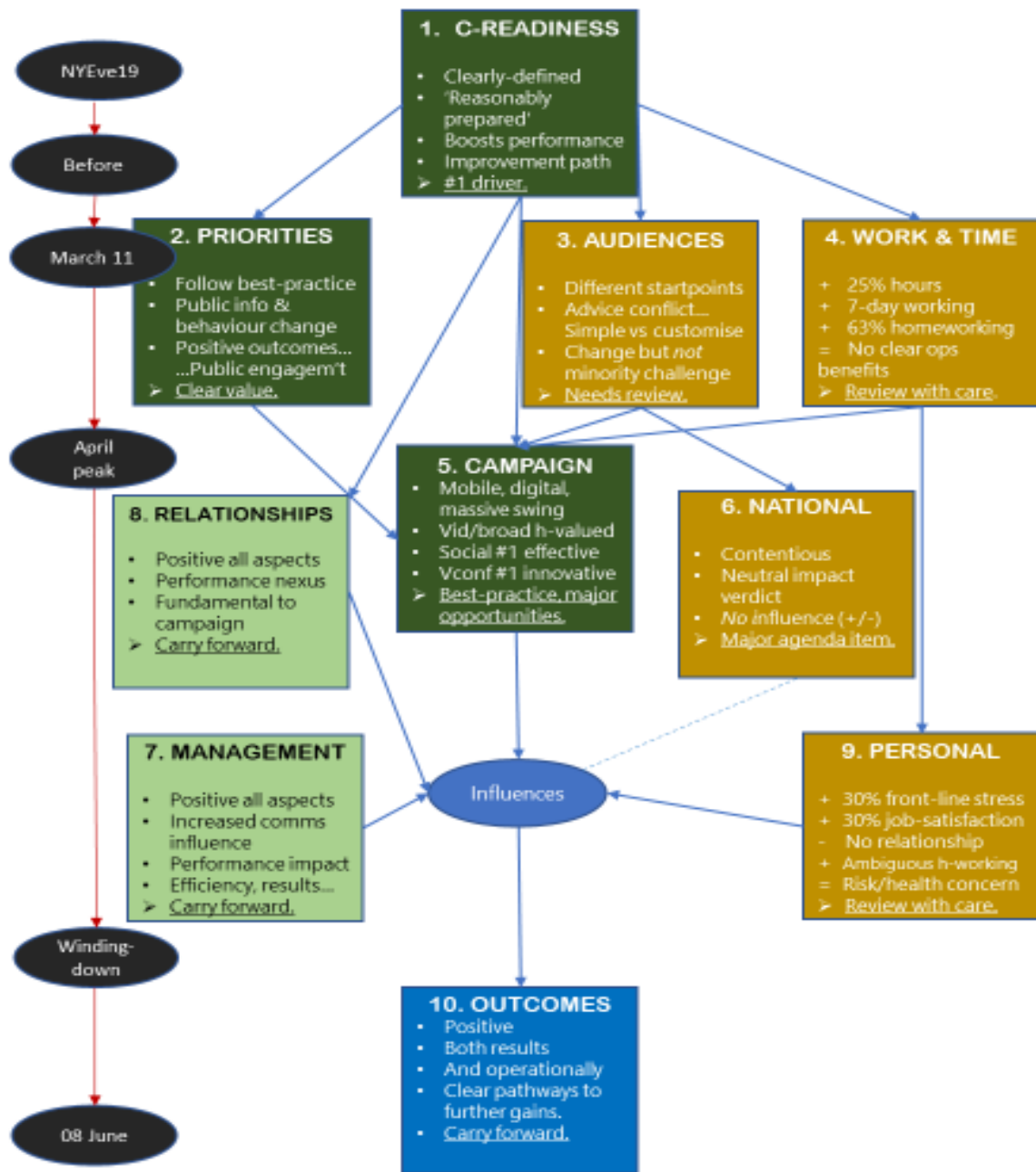
**As lockdown takes hold and infection- and mortality-rates rise, major trends emerge from the unfolding 'campaign' in terms of:**

- V. *Channels and tactics* (S8): communicators' media-channel strategy transforms. Thus, (i) mobile nearly doubles, followed closely by (ii) digital/social. Meanwhile, (iii) conventional print declines and (iv) face-2-face, understandably, is near-eliminated. Among toolkits, however, video-broadcast has most impact on outcomes and, by communicators, is most valued. Among individual tactics, social media elements are reported most *effective* and the not so 'new kid', videoconferencing, most *innovative*. This experience defines opportunities for future development but also a caveat on the risks of lost personal communication.

**Next four during-Pandemic influences, or moderators of the mechanism that translates local campaign activities into final outcomes (e.g. effectiveness):**

- VI. First, *National communications leadership* (S9) rates, on average,

Figure 1a: Anatomy of a pandemic



Source: Authors. (Note: green elements indicate generally positive contributions and amber/yellow, those meriting review).

neutral for e.g. content-provision, strategy and command-and-control. But 'national' impact generates much contention. Perhaps as a result this study finds *no* (or no consistent) evidence of either positive or negative association from activities to outcomes. *Lack* of influence, rather than neutral assessment per se, is a major issue for future review.

- VII. Second, local *Senior management* (S10) rates positive across e.g. active involvement with communicators, faster decision-making and generally faster approvals. This partly results from communicators' own increased influence at top-table. Collectively, this engagement enables positive outcomes and offers a template for future working.
- VIII. Third, other professional *Relationships* (S11) also rate significantly positive across four tested groups: other colleagues, other communicators, partners and media. These relationships are also major enablers of positive campaign outcomes. They similarly offer a future working template.
- IX. Fourth, *Personal factors* (S12) also play an influencing role. Thus job-*Stress* rises 30% partly associating with (i) longer-hours and, as noted above, (ii) degree of community time delivered and (iii) national issues. Conversely job-*Satisfaction* is up a similar (uncorrelated) 30%

- X. but associates negatively with the level of homeworking and with *Relationships* weakened by homeworking. There is qualitative support for the benefits of new working patterns. These findings, however, suggest that sensitive change management is required to render them sustainable.

***Finally, as the initial 90-days wind down in late-May/early-June, communicators reflect on:***

- XI. Generally positive *Outcomes* (S13) across both (i) communications practice (e.g. creativity, innovation and results) and (ii) operationally (e.g. efficiency and effectiveness). Insofar as these associate with prior elements, they highlight potential developmental routes. Thus, for example, campaign efficiency is, in part, a variable of colleague-relationships, speed of approvals, board-influence capability, crisis readiness and public assurance capability

***In conclusion,*** the paper reviews respondents' perspectives on change as they affect individuals, organisations and the wider NHS (14.0). It also suggests an upcoming communications agenda (15.0). The latter includes concerns about public expectations management in the 'new normal' and how best to identify and secure beneficial *Pandemic*-inspired change.

## 2: WHY THIS STUDY: CALLS FOR RESEARCH

### Context and Summary

This study responds to four research calls - one England national (2.1), three general/global (2.2-2.4) - and a fifth 'gap' (2.5) identified in preliminary research.

**2.1** *First*, "as it happened, the COVID-19 *Pandemic* constitutes a rare (perhaps unique) opportunity to identify and report emerging NHS best-practice" in *Outbreak Communications* (A8).

This call collectively by NHS communicators (including CHCR graduates) and study collaborators at NHS Confederation and NHS Providers.

**2.2** *Second*, to identify: "what tools can help countries, governments and organisations around the world adapt global communications guidance and information most effectively for their audiences" [3:59].

This glosses: "well-informed...local area" (1.1).

**2.3** *Third*, to investigate how communications can "better achieve behaviour change?" [3:59].

This glosses: "and what is expected of them" (1.1).

**2.4** *Fourth*, to conduct studies during, and immediately after, an outbreak [1], as called for following the 2009/10 influenza pandemic.

'Intra' studies help identify weaknesses in 'health systems... at international, national, regional and even individual facility level(s)' [2]. They mitigate risks of research gaps and of limited, and primarily, retrospective evidence [1,3].

**2.5** *Fifth and finally*, pandemic communications literature generally treats communicators as anonymous observers or peripheral participants.

Its primary objects include: (i) other actors (e.g. clinical/public health workers); (ii) mediators (social/mass media) and information environment message efficacy; and (iii) effects upon communicatees (public/population).

This study seeks to remedy by placing communicators, their perceptions and behaviours, centre-stage in the theatre of *Crisis/Pandemic*.



### 3: LIMITATIONS & CONTRIBUTIONS

**3.1 Limitations:** just seven weeks elapsed from this study's initial conceptual discussion via creation of advisory group, design, testing and approvals to data collection. Necessarily such brevity: (i) truncates normative research process; (ii) relies heavily on prior literature reviews [1,3,4,5] and their research calls<sup>10</sup>; and risks (iii) missed opportunity and (iv) both methodological and execution error.

**3.2** Within these constraints and following the ten-topic narrative structure (1.2), two sets of findings emerge (Figure 1b): the first (left-blue) points relevant to the focal English NHS case; the second (green/right) potential contributions to *Pandemic* communications literature.

**Figure 1b – Research highlights and potential contributions**

S #		Topic	English NHS-Highlights and Contributions	International (Research) Contributions
4	I	Crisis-readiness	'Reasonably prepared', foundation influences campaign positively, operational benefits, path to further improvement.	Working example; assesses embedded crisis comms capability; 6-item scale reliability tested and confirmed.
5	II	Priorities	Aligns guidance on public information/behaviour change; positive effects confirmed.	Working example with key effects, especially trust & reassurance
6	III	Audiences	Problematic: identifies challenge of diverse organisational-type strategies; community/minority issue unaddressed.	Adds to literature by highlighting complexity of audience management
7	IV	Resources	Longer-hours, seven-day working, homeworking all quantified; operational benefits ambiguous.	Adds to literature with focus on communicator as front-line actor.
8	V	Channels and tactics	Best practice framework captures major changes and successes; highlights opportunities.	Responds to specific call for 'tools and tactics' practice guidance.
9	VI	National impact	Neutrally assessed overall amid contention; not a significant influence on outcomes.	Responds national case call, adds understanding of audience (III) 'customisation' challenge
10	VII	Senior Mge-ment impact	Positively-assessed best-practice framework for application beyond Pandemic.	Demonstrates value of intra/during study with specific call response.
11	VIII	Relation-ships	Major best practice contribution, possibly nexus of complete model.	Ditto, value of intra.
12	IX	Personal effects	Challenging reality of comms as a front-line/essential service. Major agenda item.	Ditto focus 'front-line actor'. Explores non-communicable Pandemic mental health effects
13	X	Outcomes	Best practice optimisation e.g. efficiency/ effectiveness.	Elements of operational model; 17-item five factor scale tested and confirmed.

**Source:** Authors.

## 4. TOPIC I-BEFORE THE BEGINNING: CRISIS-READINESS

<b>Summary, Findings and Potential Contributions</b>	<p>Before-<i>Pandemic</i> situation analysis finds that <i>Crisis-Readiness</i> is:</p> <ul style="list-style-type: none"> <li>• 'Active, continuous and anticipatory', measurable via six-items and widely understood/practised in the English NHS (4.1)</li> <li>• 'Essential but sub-optimal in execution' (4.2)</li> <li>• Well-exhibited by 'reasonably prepared' NHS communicators (4.3) in findings that are consistent, credible and positive (4.4)</li> <li>• The campaign tone-setter directly influencing performance (4.5)</li> <li>• A framework for incremental improvement (4.6)</li> <li>➤ In summary, a critical antecedent of successful outcomes (4.7).</li> </ul>
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**4.1** *Crisis-Readiness* (CR), preparedness for *Crisis* (A6), was historically ill-defined. Recent analysis frames CR as "minimally measures of an active, continuous and anticipatory nature (that) contextually may include enabling attributes" [26]. Accordingly, CR anticipates both (i) potential risks and (ii) resource requirements and (iii) takes actions necessary to enable effective performance. For measurement, a six-item scale includes perceptions of: (i) rigour of process, (ii) role-allocation, (iii) level of contact maintenance, (iv) advance training/rehearsal, (v) acuity of horizon-scanning [25] and (vi), added in testing to capture field disparities, 'capabilities'.

**4.2** CR is essential and one of the WHO's five principles for *Outbreak Communications* [23]. Requirements for advance preparation and "resources to be continuously updated to meet new and developing needs" are widely highlighted [1:1]. However, CR's practical recognition is often "suboptimal across all levels of the public health community" [5:1554].

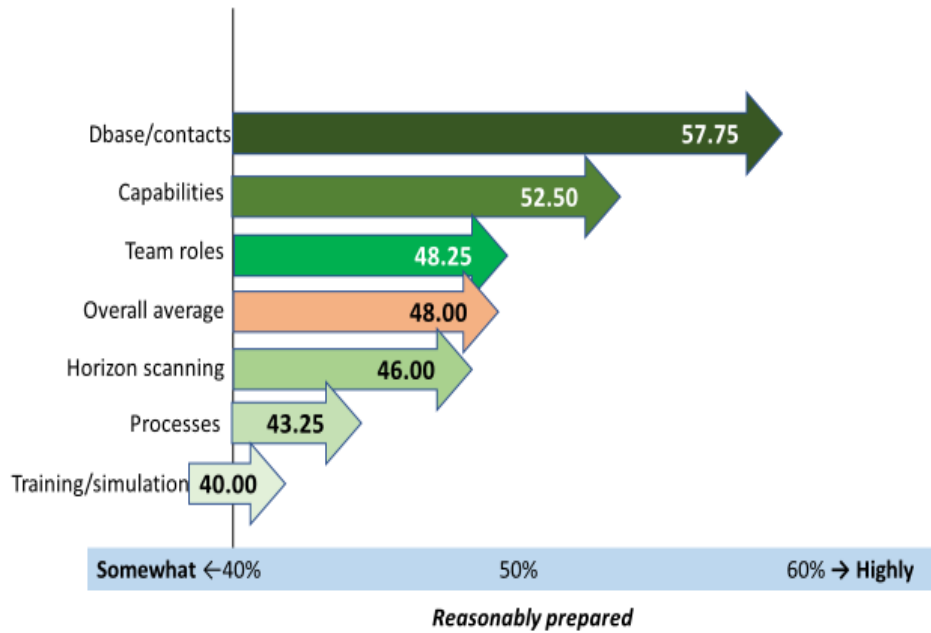
**4.3** In this English NHS case, communicators were 'reasonably prepared': both *overall*<sup>11</sup> (48%<sup>12</sup> in the mid-zone, 40-59%) and by item (Figure II).

The range on scale-items, however, is wide: 'training/rehearsal' (low, 40.00%) to 'contact maintenance' (high, 57.75%).

**4.4** These findings are:

- a. Generally **consistent**: except that both (a) VSMs (by seniority) and (ii) CCGs (by organisation) are significantly *more* positive. Speculatively: variance is explained by the former's greater knowledge/experience and the latter's smaller staffs.
- b. **Credible**: in most sectors, a comms 'crisis' is the exception. In the NHS it may be one 999-call away. So, crisis is part of the NHS comms DNA just as emergency planning is part of the operations DNA.
- c. **Positive**, given that *Pandemic* at this scale and duration is unknown to current communicators. The prior *H1N1 swine 'flu* (April 2009-early 2010) did feature C19-comparable infection rates. Mortalities, however, were far fewer (360 by January 2010<sup>13</sup>). Additionally, after six months, both vaccine and mass immunisation programme were available.

## II – Crisis-readiness: “reasonably prepared”



**4.5** CR sets campaign ‘tone’. It associates positively with: (i) communicators’ ability to influence local organisational boards (*better prepared, more credible*); (ii) overall campaign efficiency; and (iii) effectiveness<sup>14</sup> (both the *better, the greater*). Further, predictively (from regression), CR explains a not insignificant 5-9%<sup>15</sup> of each item.

**4.6** CR also offers, via item-analysis, a structured approach to further improvement. For example: the capability item’s flat distribution<sup>16</sup> shows both significant ‘not at all-’ and ‘completely-prepared’ groups. As a solution to such

mismatches, unprompted comment supports both ‘flexible working’ and active ‘secondment’. Similarly, analysis may ‘unpack’ each item to help deliver both higher ‘preparedness’ and ‘outcome’ ratings.

**4.7 Summary** - these findings (i) suggest that organisations that invest in communications’ *Crisis-Readiness* improve campaign execution. They also (ii) align with a stream that relates ‘crisis-preparedness’ and overall organisational performance [27], and (iii) contribute to a future *Pandemic* planning agenda.

## 5. TOPIC II-SETTING COMMUNICATIONS PRIORITIES

<b>Summary, Findings and Potential Contributions</b>	<p>As 'reasonably prepared' communicators (4.0) move into <i>Outbreak Communications</i> mode in mid-March, they:</p> <ul style="list-style-type: none"> <li>• Prioritise among communication <i>Goals</i> - direction as opposed to destination <i>Objectives</i> (5.1) – including e.g. reputation management, behaviour change (5.2)</li> <li>• Follow best-practice generally i.e. public information, institutional trust, and behaviour (5.3)</li> <li>• Adjust <i>Priorities</i> accordingly and consistently (5.4)</li> <li>• Report positive outcomes e.g. for <i>Public Engagement</i> and, especially, reassurance (5.5) as a direct antecedent of overall effectiveness (5.6)</li> </ul> <p>➤ Evidence clear value in the NHS approach adopted (5.7).</p>
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**5.1** To prioritise is to rank communications *Goals* i.e. short, simple statements "rooted in the organisation's mission or vision... stated in general terms and lack(ing) measures." A *Goal* sets "direction whereas an *Objective* indicates destination" [28:97].

**5.2** In this context, relevant *Goals* are founded on communications 'four-model' theory [22:24] i.e. to (i) provide public information, (ii) manage reputation, (iii) undertake engagement/ consultation and (iv) achieve public behavioural change. (Advance testing separated the last into 'general public' and 'staff' options: therefore, five items overall.)

**5.3** Selection of *Priorities* is usually contingent "on the nature of the organization and... of the environment" [22:43]. For *Pandemic*, US CDC stresses public information only: "the ability to develop, coordinate and disseminate information, alerts (and) warnings" [33]. NHS England's EPRR reference (1.1) concurs and adds a behavioural focus: "and what is expected of them" [6:29]. One review's expert panel extends and postulates that during-pandemic *Priorities*

should be: (i) maintenance of institutional trust; and (ii) stimulated uptake of preventative behaviours; as (iii) the antecedents of outbreak control [3:35]. This normative formula re-appears in the UK Government's original C19 messaging:

- Institutional trust + preventative behaviour  
= outbreak control
- Protect the NHS + stay-at-home  
= save lives.

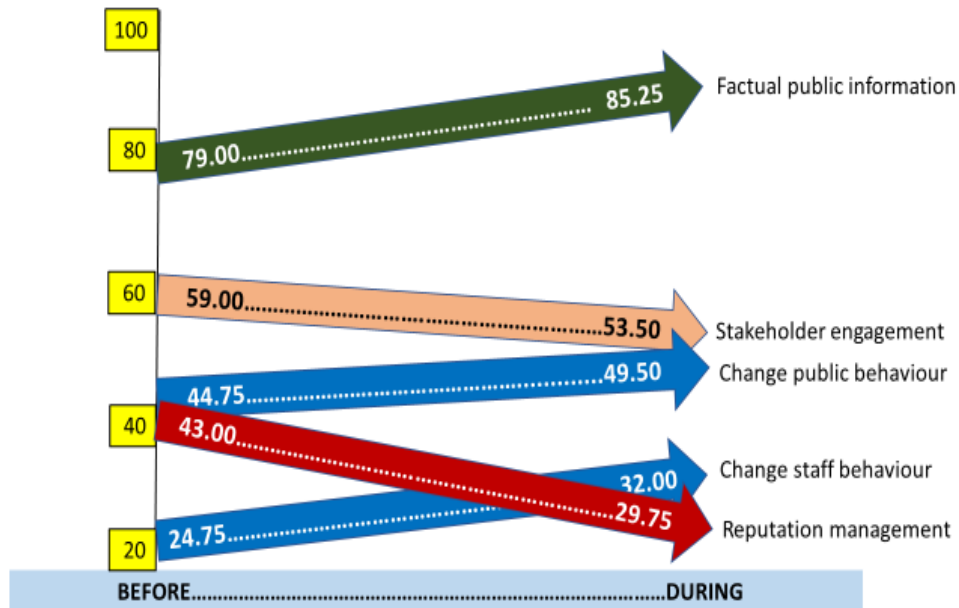
**5.4** During-*Pandemic* NHS communicators apply limited consensus (5.3) and increase emphasis on both public information and behaviour-change (Figure III). Thus they:

- i. Reinforce the #1 status of public information (the public service obligation);
- ii. Intensify 'public behaviour change'<sup>17</sup> so that it nearly overhauls #2 'stakeholder engagement' (and succeeds among Systems' respondents);
- iii. Enable 'staff behaviour change' to overturn a near 20-point gap to take #4 and to relegate 'reputation management' to last, #5. (An

understandable demotion: “we haven't had to defend the organisation or the NHS to the same extent. People, including media, have been very positive since the pandemic started.”

These findings are consistent (organisation-type, region, seniority) except that ‘before’ VSMs alone place ‘stakeholder engagement’ at #1.

### III – Pandemic goals, adjusting priorities



**5.5** Communicators’ during-Pandemic adjustments (5.4) to *Priorities* associate positively with relevant outcomes e.g. a three-item *Public Engagement* scale, one of five factors derived from an exploratory factor analysis (EFA)<sup>18</sup>. Individual ‘public engagement’ items<sup>19</sup> score highly and in the ranking order implied by priority selection: i.e. (i) accurate public information’ (88.5%); (ii) public reassurance (83.00%); and (iii) ‘public behaviour change’ (72.50%). The last’s rating is reduced by *less* enthusiasm among higher-band respondents (i.e. an inverse association with seniority)<sup>20</sup>.

**5.6** Further, of the three *Public Engagement* items, ‘reassurance’ has a direct, predictive

relationship with overall campaign effectiveness<sup>21</sup>. This suggests that attitudinal campaign components are most effective.

**5.7 Summary:** NHS communicators (i) follow the public information imperative, (ii) increase commitment to behaviour change, and (iii) demonstrate the power of public ‘reassurance’. Per expert panel [3], they thereby reinforce (institutional) *Trust* i.e. the degree to which a trustor is willing to continue to rely on, and have confidence in, a trustee [34:315]. This English NHS case, therefore, supports and extends the prior limited consensus. Its potential for optimisation requires further investigation.

## 6. TOPIC III-AUDIENCES: SELECTION & TARGETING

<b>Summary, Findings and Potential Contributions</b>	<p>Alongside <i>Priorities</i> (5), communicators also adjust <i>Audiences</i> which are:</p> <ul style="list-style-type: none"> <li>• Groups with a mutual relationship with an organisation captured in a seven-way classification (6.1)</li> <li>• Subject to prior conflicting advice/ findings e.g. recognition of, and response to, minority needs (6.2)</li> <li>• Superficially unadjusted (6.3) but at organisation-level the focus of distinct 'before' strategies (6.4)</li> <li>• Partly re-aligned 'during'... (6.5)</li> <li>• ... (But) insufficiently to address the challenges identified (6.6)</li> </ul> <p>➤ As a result, planning review is recommended (6.7).</p>
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**6.1** *Audience* denotes a “group of people who have a mutual relationship with an organization” [28:58]<sup>22</sup>. Advance testing confirms a seven-way classification: (i) internal except for (ii) senior management plus (iii) patients, (iv) community/public, (v) regulators/arms-length bodies (ALBs), (vi) partners (e.g. local authorities and other NHS within a 'system') and (vii) media.

**6.2** Prior literature reports two unreconciled *Audience* strategies: first to prefer a standard 'one-size' approach (e.g. US CERC) to public information as both “valuable” [1:9] and internationally recognised [29:84]; second to note that “different groups (have) different needs and (react) differently to the same communications materials” [3:21] and customise accordingly. Indicatively, standard approaches: (i) are often “inadequate for... minority communities”, e.g. after Hurricane Katrina [30]; (ii) may create “communication inequalities [in] using health information and resultant impact on knowledge and behaviors” [4:170]; and (iii) contribute to disproportionate suffering. Yet “no (pandemic) experimental study (probes) the potential of segmenting the population by sociodemographic and behavioral

factors” [4:179] or of providing “legitimate spokespeople” [31]. This unresolved debate re-emerges in the contention around NHS national-level control of local messaging (9.0).

**6.3** Following allocation<sup>23</sup> of average increased hours (~25%, 7.0), NHS communicators, at first sight, do **not** make significant 'during' *Audience* adjustments (Table IV). Pro-customisation, for example, should manifest in increased during-weighting among e.g. community, patients, and media. In practice the reverse marginally applies. This configuration is consistent by whole sample, by seniority/band and by region<sup>24</sup>.

**6.4** However, organisation-type reveals distinct *Audience* strategies, the challenge

<b>IV – Time per Audience</b>			
	<b>During</b>	<b>Before</b>	<b>Delta</b>
Internal	31.56%	30.40%	1.16%
Patients	13.53%	15.43%	-1.90%
Community	15.99%	16.47%	-0.48%
Regulator/ALBs	5.51%	4.91%	0.60%
Partners	9.50%	9.32%	0.18%
Media	12.40%	13.13%	-0.73%
Senior Managers	11.50%	10.34%	1.16%
	<b>100.00%</b>	<b>100.00%</b>	

originating before-*Pandemic*. Thus before, approximately 40% (17/21) of audience segments<sup>25</sup> deviate by >20% from whole-sample averages (standardised at 100%, see simplified<sup>26</sup> Figure V). For example:

acute-before shows *higher* internal focus (green 120.54%) but *reduced* partnership activity (red 66.62%); community-before emphasises patients (green 140.46%) but downgrades media (red 52.15%).

<b>V - Time Allocations (organisational type vs audience – before)</b>							
<i>Audiences</i>							
<i>Type</i>	<i>Internal</i>	<i>Patient</i>	<i>Community</i>	<i>ALB/Regs</i>	<i>Partners</i>	<i>Media</i>	<i>SenMangs</i>
<b>Whole sample</b>	<b>100.00</b>	<b>100.00</b>	<b>100.00</b>	<b>100.00</b>	<b>100.00</b>	<b>100.00</b>	<b>100.00</b>
1. Ambulance			121.40%			157.66%	
2. Acute	120.54%				66.62%		
3. Mental						66.40%	
4. Community		140.46%				52.15%	75.14%
5. System	43.85%	72.48%	123.09%		248.86%	67.12%	169.05%
6. CCG/CSU	74.90%		124.66%		130.91%		
**** coding	< 80%	80-94.99	95-104.99	105-119.99	120%+		

**6.5** From this baseline, during adjustments include: (i) **ambulance trusts** sustain community, reduce media but elevate both internal and ALBs/regulators above the 100% norm; (ii) **acute trusts** increase low partnership ratings but elevate already high internal commitment (the latter possibly reflecting (a) higher staffing levels and (b) a mediation concept i.e. staff as community 'ambassadors'); and (iii) **CCGs** raise low internal commitment and an already high partnership score. Perhaps mediation again for the latter: *"We will (produce).....more partnership communication and engagement plans - the use and development of shared COVID-19 social media channels have worked extremely well and amplified messages."*

**6.6** If these adjustments respond to organisational imperatives, they do not address minority challenges<sup>27</sup> (6.2). As UK

media confirms at end-April: "people from a BAME background make up about 13% of the UK population but account for one-third of patients admitted to hospital critical care units" [32]. To borrow a Norwegian summary<sup>28</sup>: "Everybody else is marinated in information on Covid-19 from morning to evening but not groups that do not tune into mainstream media." [32]

**6.7 Summary:** the English NHS encompasses diverse organisational types: mission, patient-focus, and governance. Understandably, individual types employ distinct *Audience* strategies. Yet Systems apart<sup>29</sup>, the neglect of community focus (confirmed by general silence among unprompted comments) suggests either failure to adopt prior learning and/or material constraints. At the least, it merits serious review in future planning.

## 7. TOPIC IV-INPUTS: WORK & TIME

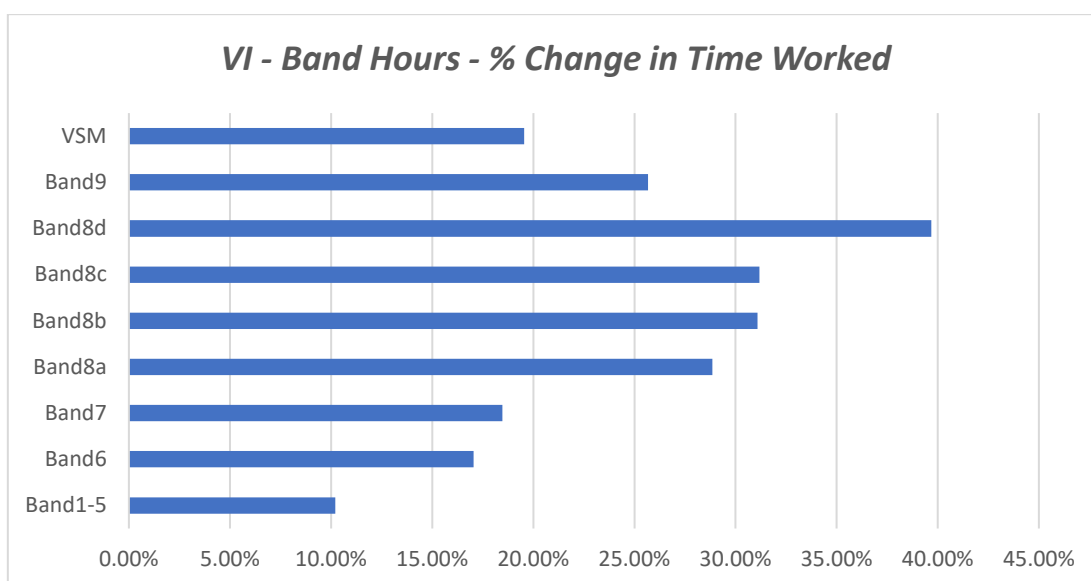
<b>Summary, Findings and Potential Contributions</b>	<p><i>Inputs</i>, the third 'during' adjustment, is the subject of major changes as communicators:</p> <ul style="list-style-type: none"> <li>• Work longer (average 25%) but with significant variation. Band 8d, up 40%, increases most (<b>7.1</b>)</li> <li>• Switch predominantly (average 63%) to homeworking (<b>7.2</b>)</li> <li>• Adopt seven-day working patterns (<b>7.3</b>)</li> <li>➤ Yet these changes do not consistently support operational benefits (<b>7.5</b>) arguing for careful review of longer-term effects (<b>7.6</b>).</li> </ul>
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**7.1** First, during-*Pandemic*, NHS communicators work longer: on average by nearly 25% (24.91%, 51.38 vs. 41.14 hours). Maximum during-hours reach 85 (*god knows*, VSM) vs. 65. There are, however, significant variations. By seniority, Band 8 (a-d) reports the greatest increase: especially 8d up nearly 40% (39.69%, Figure VI). Speculatively, this is a 'cascade' effect as Band 8s share the load with already long-working 9s/VSMs. By organisation: (i) ALBs/ regulators (caveat: small sub-sample), report the *greatest* increase (36.76%), perhaps a result of *greater* national exposure; (ii) community trusts

*least* (17.42%); and (iii) acutes, contra anecdotes of over-stretch, just above the mean (29.00%).

**7.2** Second, communicators switch predominantly to tele- or home-working (63%, 3.41 home-days of an overall average 5.5).

**7.3** As a third and final during-*Pandemic* trend, communicators also move to seven-day working rotas (to enable continuous cover). On average they work at home for 3.41 days; on-site for 1.98; and are off-duty=1.60.





**7.4** Operationally, the cumulative effects of these three changes are ambiguous. Some - compelled by circumstance, facilitated by technology – report strong positives: *'the biggest single change is to [sustain] agile working: we don't have to be office-based to be effective... I will now convince my HR team that successful candidates [need not] base themselves physically in the office.'*

For others conversely, as homeworking increases so it inhibits. Indicatively there are weak *negative* associations<sup>30</sup> with e.g. perceptions of (i) resource availability, (ii) campaign efficiency and abilities to (iii) access audiences and (iv) achieve practical communications results. Conversely, as on-site working rises, all four record weak positive associations<sup>31</sup>.

Speculatively, these findings are the product of negative mindsets cultivated on

the fertile ground of longer hours. Thus, as both hours-during **and** hours-before increase they associate negatively with respondents' assessments of overall NHS communications effectiveness. (Hours-before is even a weak negative predictor of during-effectiveness). Conversely as off-duty time increases there is a weak *positive* association<sup>32</sup>.

**7.5 Summary:** proponents of homeworking, accordingly, may dismiss this ambiguity (7.4) as personal 'gripes'. Nonetheless, failure to evidence positive operational associations for homeworking, seven-day working, and longer hours is striking. When coupled with indicative psychological effects (12.0), it counsels sensitive review before instituting permanent change.

## 8. TOPIC V-CAMPAIGN: CHANNELS, TACTICS, OPPORTUNITIES

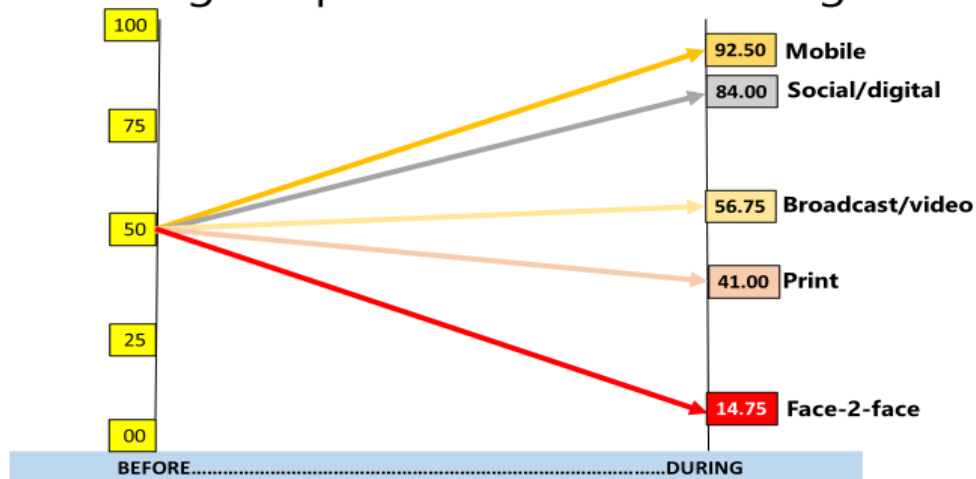
<p><b>Summary Findings and Potential Contributions</b></p>	<p>Collectively <i>Priorities, Audiences, and Inputs</i> (5-7) influence the selection of actual during-<i>Pandemic</i> campaign channels and tactics where:</p> <ul style="list-style-type: none"> <li>• Channel strategy swings mobile-nearly double-and digital (8.1)</li> <li>• Channel usage is consistent across the English NHS (8.2)</li> <li>• Among toolkits, however, video-broadcast is most valued (8.3)</li> <li>• Among individual tactics, social media is most effective and videoconferencing most innovative (8.4)</li> </ul> <p>➤ The emerging framework offers one answer to the research call for clarity (2.2) and includes two major opportunities and an important caveat for communicators (8.5).</p>
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**8.1** During-*Pandemic*, channel strategy transforms. Compared with a 'before' 50.00 ('about the same') benchmark, (i) mobile usage, at 92.50, nearly doubles. It is closely followed by (ii) digital/social (84.00): "*biggest change has been increased use of digital and social media to share information and updates with internal and external audiences - particularly around staff briefings.*" Meanwhile: (iii) broadcast/video advances modestly (56.75); (iv) print, supportive minority noted, declines (41.00);

and, unsurprising, (v) face-2-face all but disappears (15.75, Figure VII).

**8.2** 'During' strategy is also consistent. With minor variations, the overall pattern (8.1) repeats by region, organisation and seniority. There are supporting associations between: e.g. (i) negatively both mobile and digital usage and face-2-face; and (ii) positively both print and video and the separate media relationships.

VII – During the pandemic: channel usage



**8.3** Regards activities, communicators assess value (impact) of tactical toolkits in line generally with reported channel usage.

The **exception** is video/broadcast at 81.25 value (vs 56.75 usage, benchmark 50.00). Indicatively, alone among toolkits, it

reports a limited direct relationship with communications effectiveness.

**8.4** Among tactics, social media and videoconferencing rank, respectively, most effective and most innovative. Ratings derive from unprompted review generating an initial 43 clusters of citations. Pareto, however, applies. The top five clusters per category account for 64-65% of all citations (Figure VII).

**8.5 Summary:** these findings answer calls for (i) 'tools and tactics' guidance (2.2) and (ii) a planning framework. They suggest that prior lessons regarding 'social media skills' [3:27] and utilisation [3:49-50] are well learnt. In the English NHS case (perhaps generally), they also highlight two opportunities for communicators to own, shape and lead. And one caveat.

- i. *First*, videoconferencing's potency, as *Pandemic* communications technology-enabler, extends beyond home working and internal audiences. E.g. "*Patient comms is the biggest innovation - the move to telephone/video conferencing has been a challenge for years and now*

*within weeks it is commonplace.*" By extension, assuming normative adoption, VC offers a platform for many new public facing applications.

- ii. *Second*, effective innovation may be low-cost and incremental. COVID-specific closed-user groups (CUGs) on the 16-year old Facebook platform garner top-five 'nominations' for both effectiveness and innovation. Similarly, intranets: the fully collaborative, productivity-focused 4<sup>th</sup>-generation (not respondent term) elicits honourable *during-Pandemic* citations and offers massive power.
- iii. *Third and finally*, caveat: this much acclaimed technology transformation is not a universal communications panacea. It also "*disassociates comms from F2F contact and relationship building with staff and presents huge barriers to gathering strong messages... The result is less rich and powerful communication.*"

VII – Top Five –		Individual Categories			
Most Effective	%	Least Effective	%	Most Innovative	%
1 Social media in general	17.9	Face-2-Face in general	19.4	Videoconferencing/ MS Teams	33.3
2 Video-conferencing (e.g. Teams)	14.2	PR/Press/media briefings	17.8	Facebook Staff CUG	11.3
3 Bespoke e-briefings	13.6	Global emails	14.7	Other video/virtual meetings	09.3
4 Facebook (Staff CUGs)	09.9	Posters	09.3	WhatsApp	06.6
5 'All Hands' Emails	08.6	Staff Intranet	03.9	Webinars	04.7
<b>Total Top Five</b>	<b>64.2</b>	<b>Total Top Five</b>	<b>65.1</b>	<b>Total Top Five</b>	<b>65.2</b>
<i>Response (162/166)</i>	<i>64.2</i>	<i>Response (129/166)</i>		<i>Response (150/166)</i>	

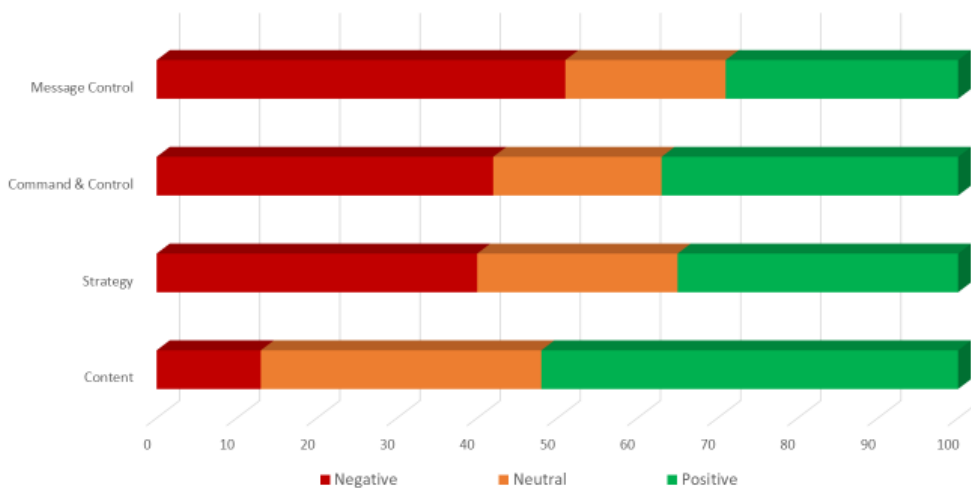
## 9. TOPIC VI-INFLUENCE: NATIONAL COMMS LEADERSHIP

<b>Summary Findings and Potential Contributions</b>	<p>Further into the focal <i>Pandemic</i> 90-days, the extent to which initial choices (5-8) translate into successful outcomes is subject to various influences.</p> <p><i>First national NHS communications leadership:</i></p> <ul style="list-style-type: none"> <li>• Obtains a neutral verdict, content-provision viewed most positively (63.5%) and control of local messaging least (42.5%) (9.1)</li> <li>• Generates sharply conflicting views (9.2)</li> <li>• Encounters both personal and contextual negativity framed, by inference, from a historic base (9.3)</li> <li>• But does not exercise <i>any</i> influence (positive or negative) on campaign outcomes (9.4)</li> </ul> <p>➤ May wish to review how better to engage with, and harness the value of, communications teams 'on the ground' (9.5).</p>
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**9.1** The national 'report-card' is broadly neutral. Illustratively, communicators assess national: (i) **content** positively (63.5% vs. 50.00% neutral); (ii) **strategy** and (iii) **command-and-control**, respectively, as marginally 'ineffective' (48.25%) and 'inappropriate' (47.00%); and, most negatively attempted (iv) control of local **messaging** as 'unacceptable' (42.5%, Figure VIII).

**9.2** But this neutral verdict is not consensus (Figure VIII). Distinct parties support: "Criticism is a bit over the top, comes with hindsight. The Covid-19 experience has shown that NHS comms is generally of a high standard." And dissent: "Biggest challenge at FT level is the misuse of command and control from the centre... regressive because so unresponsive... the role of regional has hindered responses and frustrated many senior leader(s)."

VIII – National leadership contribution



**9.3** The negative association of (i) senior frustration (9.2) is supported statistically. It is joined by (ii) longer hours and (iii) greater stress (both compelling personal factors); and (iv), echoing a research call, among those who prioritise public behaviour change<sup>33</sup> and, by extension, greater autonomy:

- *"The national team cannot run comms from... London to parts of the UK with very different needs and audiences" (6.2/6.6).*

This concern applies especially if, per literature, "explanations of complexities and uncertainties" matter as much as "provision of information" (1:12).

Yet, although entirely understandable, these variables collectively explain less than 20% of any national item<sup>34</sup>. By implication, during-Pandemic conditions may exacerbate negativity, but its origin may lie (historically) elsewhere.

**9.4** However contention is explained, the most striking finding is a **lack** of any consistent influence (positive or negative)

by national communications leadership on campaign outcomes.

No national item (of four) reports any statistically significant association with, or effect on, respondents' final assessments of communications results, campaign efficiency, and effectiveness<sup>35</sup>.

Contextually, the issue also ranks only fifth among 'wider NHS' citations (14.2).

**9.5 Summary:** blow away the 'smoke' of contention (9.2) and putative personal and contextual explanations (9.3), this **lack** of influence (9.4) is egregious. It suggests that national policy- and strategy-formulation neither secured shared goals [3:57] with local teams nor 'harnessed' the potency of a ~3000-strong communications field-force:

- *"The biggest missed opportunity is not harnessing the talent, knowledge and local intelligence of the teams on the ground across the country."*

Accordingly: a major agenda item for optimisation of future performance.

## 10. TOPIC VII-INFLUENCE: LOCAL SENIOR MANAGEMENT TEAMS

<b>Summary Findings and Potential Contributions</b>	Exploring influences, <i>second</i> local senior management teams: <ul style="list-style-type: none"> <li>• Win for their actions a sharply contrasting positive (10.1) and consistent (10.2) verdict...</li> <li>• ... Facilitated by generally increased communicator influence (10.3)</li> <li>• Enable beneficial communications outcomes (10.4)</li> <li>➤ Make a strong case for wider application of this approach (10.5).</li> </ul>
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**10.1** Contra the neutral national report-card (9.1), "*communications has been more appreciated by senior leaders over the last few months and they have looked to us more frequently for assistance and advice.*" Specifically, local senior management teams demonstrate: (i) more active communications **involvement** (78.00%); (ii) faster **decision-making** (80.75%); and (iii) generally matching fast **approvals** (72.50%).

**10.2** This behavioural pattern is consistent across filters. Minor variation occurs only among organisation-types. Thus (i) ambulance- and mental-health trusts score *higher* and (ii) CCGs and Systems marginally *lower*.

**10.3** A part-explanation for senior teams' changed behaviour lies in increased communicator **influence** (77.5%) at top table. It associates positively, for example, with speed of approvals<sup>36</sup> i.e. where influence and/or (second association) active board involvement are *less*, so approvals are *slower*. In turn, level of influence attained may rest partly on the perceived success of the highly valued video-broadcast toolkit (8.3). The toolkit achieves, for example, positive moderate associations with all four management items.

**10.4** Most important, influence and involvement collectively shape **beneficial outcomes**. Communicator influence, for example, alone explains: (i) 16.70% of campaign effectiveness and (ii) 27.90% of comms results; and (iii) combined with 'speed-of-approvals', 28.00% of efficiency<sup>37</sup>. Additionally, all four management items have weak/moderate associations with primary outcomes: overall effectiveness, campaign efficiency and communications results<sup>38</sup>.

**10.5 Summary:** where evidenced, senior involvement and communicator influence facilitate positively the efficacy of preparation and campaign choices (4.0-8.0). These findings: (i) support the literature proposition that "communication expertise... is at least equally essential to outbreak control as epidemiological training and laboratory analysis" (1:2); (ii) constitute guidance for weaker organisations in future *Pandemic/Crisis* planning and, by extension, (iii) for all organisation-types under normative operational conditions. More generally, the findings suggest that senior management involvement is a component of an overall *Pandemic Outbreak Communications* model.

## 11. TOPIC VIII-INFLUENCE: OTHER RELATIONSHIPS

<p><b>Summary Findings and Potential Contributions</b></p>	<p>Exploring influences, <i>third</i> other relationships:</p> <ul style="list-style-type: none"> <li>• Complement the senior management advance (10.0) and improve substantially (<b>11.1</b>) and consistently (<b>11.2</b>)</li> <li>• Facilitate beneficial outcomes (<b>11.3</b>)</li> <li>• Emerge as an important nexus in campaign execution (<b>11.4</b>)</li> <li>➤ Provide a crucial component for future improvements (<b>11.5</b>).</li> </ul>
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**11.1** The senior teams’ effect (10.0) is matched among communicators’ *Relationships* with four more groups: other colleagues, other NHS communicators, partners and media. On average, these *Relationships* nearly 30%<sup>39</sup>, over 40% with colleagues and even 19.28% with often-maligned media (Figure IX).

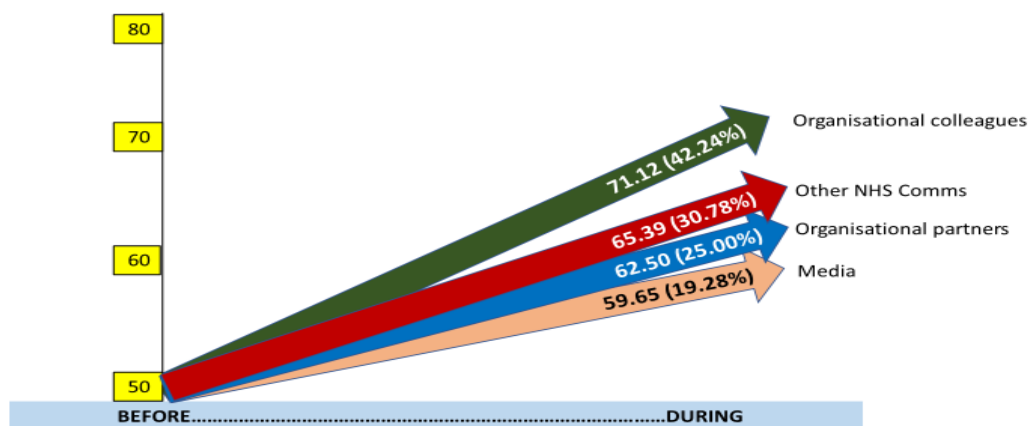
**11.2** Improvements are generally consistent (region, organisation, seniority). Among minor variations, London advances *least*: just 5.58% with media.

**11.3** Collectively these developments facilitate positive outcomes. Thus, relationships with: (i) colleagues contribute directly to efficiency (35.3% explanation); and (ii) other NHS communicators and partners to overall effectiveness (23.5% explanation).

**11.4** Overall, *Relationships* emerges as a ‘nexus’ in a putative model of *Outbreak Communications*. Among antecedents, *Crisis-Readiness* (4.0) associates positively with all four relationship items. Among consequences, *Job-Satisfaction*<sup>40</sup> is a major output (albeit associates negatively with homeworking, 12.0).

**11.5 Summary:** this English NHS case supports the literature proposition that “effective and responsible communication... encourages working relationships among all interested parties” (1:5). *Relationships*, accordingly, are fundamental to the campaign’s ‘transmission mechanism’ and a major facilitator for further improvements.

IX – On a roll - relationships



## 12. TOPIC IX-PERSONAL EFFECTS: STRESS & SATISFACTION

<b>Summary Findings and Potential Contributions</b>	<p>Moving towards outcomes, analysis investigates the cumulative impact of <i>Pandemic</i>-working on front-line communicators:</p> <ul style="list-style-type: none"> <li>• First-time exploration of non-communicable <i>Pandemic</i> mental effects (12.1)</li> <li>• <i>Job-satisfaction</i> up 30% but impacted negatively by homeworking and homeworking-weakened relationships (12.2)</li> <li>• <i>Job-stress</i> also up 30% influenced by longer hours, community time and national issues (12.3)</li> <li>• No stress-satisfaction correlation (12.4)</li> <li>➤ The whole not sustainable in either the 'new normal' or a second-wave. Sensitive change required to capture benefits (12.5).</li> </ul>
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**12.1** 90-days of longer hours, seven-day rotas and much homeworking. Staff are 'exhausted... tired and drained'. Yet, prior pandemic literature (2.5), is largely silent about: (i) communicators as front-line actors; (ii) their susceptibility to non-communicable effects; and (iii) the impact of such effects on performance. Two effects are relevant:

- a. *Job-stress* (occupational health/workplace epidemiology) is self-perception of "little control but many demands." It associates with "increased rates of heart attack, hypertension, obesity, addiction etc." [42:553]. As stress increases [35:281], it: (i) weakens immune systems [38]; (ii) may contribute to over 60% of illnesses treated in primary care [40]; and, in performance terms, (iii) narrows personal focus at precisely the wrong time [39]. And, note, communications rates popularly among the most stressful occupations [37]!

- b. *Mental health risks* are exacerbated by "prolonged" tele- or **homeworking** due to "long-term social isolation and lack of workplace interaction" [35:281]. Teleworking is a "broad and complex phenomenon that lacks a commonly accepted definition" [41,p3]. Its primary characteristics include intensity, timing, and degree as well as parent- and carer-roles. Outcomes are often "ambiguous" [41,p8] and, necessarily, individually contingent.

**12.2** Communicators, it's claimed, thrive on deadlines and especially on crises. Now, evidentially, as a headline, they thrive also, on average and in practice, on *Pandemics*. Thus during-*Pandemic Job-satisfaction* increases overall by 30.36% and consistently among filters. The effect, however, is individually contingent. For example, homeworking impacts negatively:

- a. Directly by a moderate association<sup>41</sup> (the higher, the lower satisfaction). "Not being physically



*present, massive impact on way of working and relating to people... (challenge of) self-motivating... complete blurring of lines... stress... coupled with living alone, has caused mental health issues."*

- b. Indirectly, perhaps mediation, via weakened *Relationships* with both colleagues and other NHS communicators. *"(Sheer) volume of work... Intense... the immediacy of (all) we do... (but) no water-cooler moments..."*

**12.3** But meantime the rub. *Job-stress* also increases by an overall average 29.70%: (i) consistently by region with peaks; (ii) by seniority in the 'engine-room' (8c, 37%); and by organisational-type, among commissioners/regulators (40%+, both cases). Weak associations partly explain: inversely (*more negative, greater stress*) with national (i) strategy, (ii) command-and-control and (iii) local message-control<sup>42</sup>; positively with (iv) increased community *Audience* time (spinning-off from that debate, 6.2/6.4) and (v) during *Pandemic* working-time<sup>43</sup>. *"(We're) always on!... very long hours/never off call has significantly impacted family life... alongside childcare responsibilities... (it's) much harder to get recovery time..."*

**12.4** However, the headline ~30% stress-satisfaction similarity is serendipity. A hypothesis that *Job-satisfaction* - "the sum of the evaluations of the discrete elements of which (a) job is composed" [43:330] - associates positively with *Job-stress* is unsupported here. There is minimal evidence: only by organisation-type, where stress is greatest<sup>44</sup> and satisfaction least at the commissioner end only of the organisational continuum.

**12.5 Summary:** extended *Pandemic*-style front-line working is not cost-free for communicators. Glib 'PRs love a crisis' comments will not suffice. Further, various *morbidity effects* may compound [36] during either a second *Pandemic* wave and/or consequent recession. Not least if, as respondents say, they must cope while '*winning public consent*' amid a '*demand surge*' and "*a very different post-pandemic NHS*" (15.0). Undoubtedly there are major (productivity) gains: "*achieving rapid transformation (via) flexible and pragmatic approaches, huge numbers of meetings stood down and people much more action-focused and urgent.*" But the whole appears unsustainable. Important parts will require further research, sensitive planning and a long-term view of change.

## 13. TOPIC X-OUTCOMES: PERFORMANCE AND ITS ENABLERS

<p><b>Summary Findings and Potential Contributions</b></p>	<p>A closing sequence aggregates 17 performance items, reduced by analysis to five mini-scales<sup>45</sup> that explain a healthy 66.87% of variance:</p> <ul style="list-style-type: none"> <li>• <i>Public Engagement</i> (5.4) and <i>Senior Management</i> influence (10.1/10.3) report positively above</li> <li>• <i>Communications National Leadership</i> reports neutrally above (9.1)</li> <li>• <i>Communications Practice</i> reports positively with creativity and innovation ahead of hard outcomes (<b>13.1</b>) and generally consistently (<b>13.2</b>)</li> <li>• Operationally comms teams were both more efficient and effective during-Pandemic albeit constrained in terms of resources (<b>13.3</b>)</li> </ul> <p>➤ Finally, the study identifies factors that can make a beneficial difference in any future event (<b>13.4</b>).</p>
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**13.1** As the 90-day peak period closes, NHS communicators believe their campaign activities have achieved positive outcomes.

Thus, a four-item *Communications Practice* scale (with confirmed construct reliability) reports a positive 80% average result and all four individual items above 75%.

Marginally its procedural components ('tools, channels and technologies' and 'creative execution') out-perform hard outcomes ('audience access', 'communications results').

**13.2** With minor variation, *Practice* findings are generally consistent.

Thus: by region, London is *less-* and the North-East *more* positive on all four items; similarly, by organisation, provider-end ambulance- and acute-trusts are marginally *more-* all four while commissioner-end Systems is *less-* on three and CCGs/ALBs both all four.

**13.3** The penultimate test, the three item overall *Outcomes* scale, is somewhat less positive (69.00%) than *Practice*. But it takes all factors into account.

Notably, there is broad consensus (all filters) that, during-Pandemic, communications teams have performed both more efficiently and more effectively. (Nearly 80% somewhat/strongly agree both cases).

The constraint is applied by 'perceived availability of resources'. One-third (33.10%) somewhat/strongly disagree that they had greater availability. Paucity is felt most strongly; by region in the South-East and Midlands; by organisation-type among systems/commissioners; and by seniority, very strikingly in the Band 8b-8c-8d 'engine-room'.

**13.4 Conclusion-what matters:** a final outcomes test aggregates earlier confirmed pathways and associations as the basis of a series of regressions. These test formally, for future planning, the key drivers (or, more formally, the antecedence) of major outcomes (Figure IX).

Illustratively, what really matters if one wishes to improve, say, overall campaign efficiency? Answer: initial *Crisis-Readiness*

sets a positive framework. It enables, in part, a communicator's ability to win *Senior Influence* and rapid approvals. Meanwhile, strong colleague-relationships underpin activities as they generate public *Assurance*. (Note also: *Assurance* plays a role in three of five outcomes highlighted but longer hours appear marginally only in one and the subject of much brouhaha, homeworking, not at all.

#### IX: Managing pandemic communications: what really mattered

- I. **Overall campaign efficiency** (38.2% variance explained): colleague-relationships, speed of approvals, board-influence capability, crisis readiness and public assurance capability
- II. **Communications results** (31.4%): board-influence capability and, very marginally, volume of during-hours worked.
- III. **Creative execution** (26.5%): public assurance capability and ability to involve the Board.
- IV. **Innovation** (25.6%): perceived value of video/broadcast tactics and board-influence capability
- V. **Overall effectiveness** (25.2%): public assurance capability<sup>46</sup>.

## 14. AFTERMATH: PERSPECTIVES ON CHANGE

<b>Summary Findings and Potential Contributions</b>	<p>90-days later in the nearly-after, 40 clusters of change from personal, local-organisational, and wider-NHS perspectives—reduced by analysis to eight dominant modes of change (<b>Figure XIII</b>). So, what changed?</p> <ul style="list-style-type: none"> <li>• It feels like everything (<b>14.1</b>)</li> <li>• For individuals, homeworking and work-intensity, both ambiguous in their effects (<b>14.2</b>)</li> <li>• For organisations, homeworking and technology as tangible examples of wide-ranging service change (<b>14.3</b>)</li> <li>• For the wider NHS, a Damocles sword of yet higher <i>Pandemic</i>-inspired perceived value (<b>14.4</b>).</li> </ul> <p>➤ Managing the expectations arising is the #1 challenge for communicators (<b>14.5</b>).</p>
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**14.1** What changed? *"Everything! Moving from a focus on our financial problems and need for a future in a hospital chain to focus on a nimble response to system needs, treating cancer patients, moving just about every clinical service to a different location on site to separate screened and unscreened patients."* Everything: *"changed systems and processes overnight that would previously have taken months if not years."* Everything.

**14.2** For individuals, the stand-out (nearly one-third citations, Figure **XII**) is

homeworking. But #4 for home-working issues underscores its ambiguous status (12.0). Meantime, #2 for 'intensity' highlights a complex, individually-contingent and cautionary value-equation.

Some will thrive: *"I feel more prepared and able than ever to do my job."*

For others, as adrenalin ebbs, so change loses its temporary allure: *"work is overwhelming and whilst incredibly rewarding at the outset of COVID, less so as the daily grind returns."*

	<b>XII – Top Five</b>		<b>– By Categories</b>			
	<b>Personal</b>	<b>%</b>	<b>Organisational</b>	<b>%</b>	<b>Wider NHS</b>	<b>%</b>
1	Homeworking	31.4	Homeworking (=)	14.7	NHS value	15.8
2	Intensity/ impact	11.4	Technology (=)	14.7	Agile working	11.6
3	Span: ops involvement	11.4	New modes of service delivery (=)	11.5	Technology	09.6
4	Homework issues	07.2	Agile working (=)	11.5	Partnership working	07.5
5	Appreciation of comms value	07.2	Culture (=)	06.1	National command and control	05.5
5=			Productivity (=)	06.1		
	<b>Total Top Five</b>	<b>68.6</b>	<b>Total Top Five</b>	<b>64.6</b>	<b>Total Top Five</b>	<b>50.0</b>
	<i>Response (166/166)</i>		<i>Response (164/166)</i>		<i>Response (146/166)</i>	

**14.3** For organisations, jointly homeworking (again!) and technology (often video-conferencing). Joint-third ranking, meantime, for new modes of service delivery and agile working emphasises *Pandemic's* transformative 'disrupter' impact characterised by:

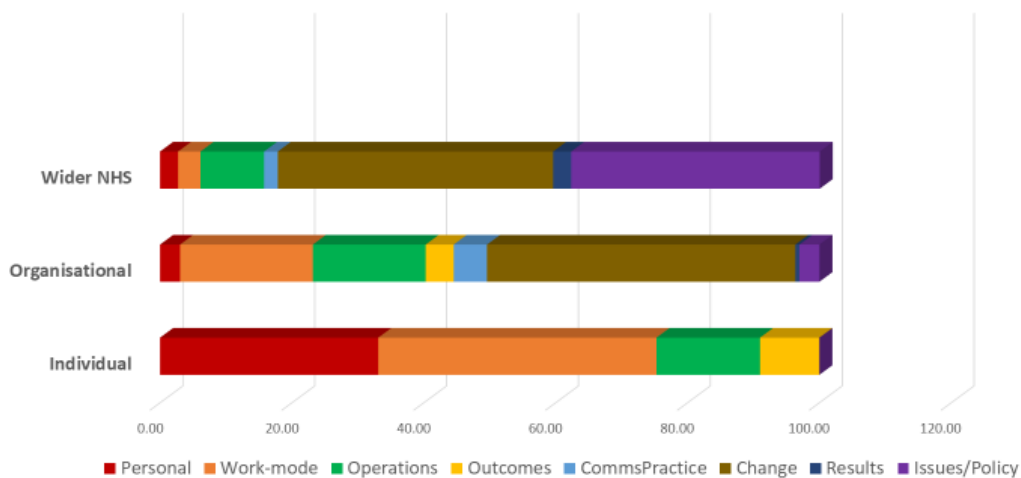
- a. **Cohesion:** *'one clear focus'* enabling staff *"in the main to pull together"*.
- b. **Commitment:** *'staff empowerment'* and matching heightened *'morale'*, normalisation of *'flexible working'* and *'staff redeployment'*.
- c. **Congruence:** greater *'system-'* and *'partnership-working'* and *'in the quiet spaces of ...empty wards'*.
- d. **Creativity:** *'rethinking'* of future delivery including online (*'video/telephony'*), *'reconfiguration of entire hospital services'* supporting *"health and social care providers to deliver services in different and new ways"*;
- e. **Communications:** breaking new ground *'across organisations, partners, stakeholders'* and *'across traditional boundaries.'*

These positive **5Cs** bring, however, adverse **Consequences** (aka *'can-kicking'*): e.g. *'de-prioritisation'* of many services/projects, including postponement of *'elective activity'* (see next).

**14.4** For the wider NHS, its own higher *Pandemic*-inspired perceived value leads a diverse field. Without doubt, *"the pandemic has strengthened the reputation of the NHS (which is) more respected... (and with) the public still onside... values the NHS more... (has a) broader appreciation and (shows) gratitude."* Characterised by *"almost a feeling of reverence"*, the NHS, accordingly, has ascended to perhaps its highest-ever pedestal in national esteem.

**14.5** Communicator-optimists hope that this exalted status lays foundations for *"better public understanding of the complexities of delivering modern healthcare."* But pessimists see it as risk-laden: *"the public has reminded itself why it loves the NHS – presenting a longer-term problem for anyone who wants to change things."* This challenge tops communicators' *'next chapter'* agenda.

### XIII – Patterns of change



## 15. AND NOW? TASKS FOR THE NEXT CHAPTER

**Note:** *our closing call for commentary elicited a rich and insightful response of which we have made liberal use throughout and for which we are hugely grateful. It merits separate extended publication. For the purposes here, a succinct 10-task summary based on weighting of interest, begins with the critical primary agenda:*

- I. Above all, staying on full **crisis communications** alert for potential 'second/third COVID waves' and, at very least, a much-heightened 'winter impact' among susceptible groups...

Second, responding concisely to the preceding section's 'risk agenda':

- II. **'Winning public consent'** for the 'new normal' of a 'very different post-pandemic NHS'. ("We have a golden opportunity to change the way in which the public access health services: my greatest fear is that we will waste it and not use what we have learned from this pandemic to reset behaviours")
- III. ...Simultaneously crafting and investing in strong 'public health messaging' to manage an anticipated **demand surge**. Many services (e.g. electives) will play 'catch-up' while others, e.g. mental health, address pandemic consequences.
- IV. **Expectations management** to retain 'public confidence' and 'protect reputation'. Or: "the media and public will start turning on the NHS as we are unable to meet expectations of restoring services and seeing people as quickly as they hope."

Third, a 'continuous change' agenda by:

- V. Engaging and sustaining **commitment** among an 'exhausted workforce'.
- VI. Sustaining (a much-repeated word) **innovation** in the face of 'increasing governance' and side-effects such as the 'digital equalities gap'.
- VII. Promoting and embedding: (i) agile working in teams, cross-organisational collaboration and general flexibility and; (ii) reduced administration ('biggest change=reduction in meetings'); and (iii) accelerated digital technology adoption.

Fourth and finally, the communications functional agenda by:

- VIII. Resetting the **relationship** with 'frustrating, hard to deal with' national communications to ensure best preparation for any second wave or future at-scale *Pandemic* event.
- IX. Building on the attractions of change to recruit and retain 'high-calibre' communications staff.
- X. Resisting a return to the 'shadows' via consolidation of communications' hard-won recognition as an '**essential service**' – even distinct 'service line'.

## ANNEX 1: PRINCIPAL TERMS AND CONSTRUCTS

**A1:** *NHS Professional Communicators*: some 3000 full-time/full-time equivalent (FT/FTE) are currently employed in ~400 constituent English NHS organisations. The most senior hold board or director status. Responsibilities include *inter alia* both internal and external relations as well as specialist activities e.g. community engagement, public affairs, and patient communications. Title- and role-designations commonly embrace both *Communications* (**A2**) and *Engagement* (**A3**). Often overlapping, these two are distinct, complementary constructs.

**A2:** *Communications*, in applied social psychology, is goal-directed and focuses on 'ends'<sup>47</sup>. It seeks to effect changes to thoughts, feelings and/or behaviours [10]. In healthcare, best-practice *Communications*: (i) rests on well-established health-behaviour models [16]; and is (ii) a modest, but statistically significant antecedent of certain clinical outcomes [17]. *Health Communications* crafts "messages that create meaning in relation to physical, mental and social well-being" [11:09] in order to "inform and influence individual and community decisions that enhance health" [12].

**A3:** *Engagement*, by contrast concerns 'means'. A "process by which information, meanings and feelings are shared" [9:07], in effect "a two way, relational, give-and-take between organizations and stakeholders/publics." It seeks: (i) "improv(ed) understanding among interactants"; (ii) decision-making that "benefit(s) all parties involved"; and (iii) decisions based on "informed participative (stakeholder) interactions" [18:391] that in turn (iv) foster a fully functioning society [19].

**A4:** *Methodology* denotes how communicators conceptualise role-portfolios and, by extension, set *Priorities* (4.2). It accommodates the *Communications-Engagement* 'end-means' dynamic (**A2-A3**) by adopting the four-way empirically founded excellence theory typology [22]: (i) public information, (ii) reputation, (iii) engagement/consultation and (iv) behavioural change.

**A5:** *Communications Mix* denotes tactical execution of integrated marketing communications (IMC) theory: "an audience-driven process of strategically managing stakeholders, content, channels, and results of [...] communication programmes" [21:140]. 'Mix' is a generic marketing and communications term that describes 'blending' of activities for a specific purpose [20] e.g. 'marketing-' or 'channel-mix'.

**A6:** *Crisis* occurs when a "risk [is] manifested" [13]. Derived from emergency preparedness, the practice of *Crisis Management* comprises "four inter-related factors: prevention, preparation, *response*, and revision" [14:05, author's ital], overlaid by *Crisis Communications*, "the dialogue between [an] organisation and its publics prior to, *during* and after the [event]" [15:09, author's ital]. *Crisis Communications* is commonly modelled in five phases e.g. classic [15] and the aligned US Center for Disease Control's Crisis Emergency and Risk Communication (CERC) framework [16]. This study features phase III data collection– containment (classic) and maintenance (CERC), and phase V 'learning' (classic) and 'evaluation' (CERC).

**A7:** *Pandemic* is a special *Crisis* case determined by: (i) substance, "a new disease" [8]; (ii) status, e.g. the World Health Organisation's (WHO) official declaration (11 March 2020); (iii) scale, "an epidemic occurring worldwide, or over a very wide area, crossing international boundaries and usually affecting a large number of people" [7]; and (iv) duration, extended often indeterminate, such as 'waves of activity spread over months' [8].

**A8:** (*Pandemic*) *Outbreak Communications* [3] accommodates the four *Pandemic* attributes (**A7**). It replaces the common crisis #1 *Priority* reputation - "to minimise damage to the image of the organisation" [15:09] - with "public information... primarily transferral (broadcasting or exchange) of information before, *during* and after an outbreak, epidemic or pandemic" [3:10].

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## A3 – END-NOTES

<sup>1</sup> Commonly estimated at a population of ~3000 across some 400 NHS organisations.

<sup>2</sup> Detailed breakdown by bands per Table A1:

<b>TABLE A1: Banding</b>	<b>Resps</b>	<b>By %</b>
Band1-5	14	8.40
Band6	15	9.00
Band7	31	18.70
Band8a	26	15.70
Band8b	27	16.30
Band8c	18	10.80
Band8d	14	8.40
Band9	4	2.40
VSM	17	10.20
<b>Total</b>	<b>166</b>	<b>100</b>

**Source:** SPSS Output (08 June 2020).

<sup>3</sup> Derived from the ~3000 population and following relevant authorities, we targeted *not less* than 120 overall for our minimum returned sample size (MRSS) and *not less* than 150 to enable more advanced techniques of analysis. We exceeded both levels at 166 (5.53%).

<sup>4</sup> To confirm regional representativeness, we cross-reference respondent numbers with residential populations per Table A2:

<b>TABLE A2: Regional Affiliation</b>	<b>Resps</b>	<b>Pop 2020 (m)</b>	<b>Resp %</b>	<b>Pop (2020) %</b>	<b>Delta (R-Pop)</b>
1. NE&Yorks	34	8.50	20.48%	15.05%	5.43%
2. NWest	29	7.04	17.47%	12.47%	5.00%
3. Midlands	28	10.68	16.87%	18.91%	-2.05%
4. EofEngland	10	6.57	6.02%	11.63%	-5.61%
5. S-East	22	8.94	13.25%	15.83%	-2.58%
6. S-West	13	5.70	7.83%	10.09%	-2.26%
7. London	25	9.04	15.06%	16.01%	-0.95%
8. Other (inc Nightingale, AHSN)	5	0.00	3.01%	0	3.01%
<b>Total</b>	<b>166</b>	<b>56.47</b>	<b>100.00</b>	<b>100.00%</b>	

**Source:** SPSS output (08 June 2020) and Office for National Statistics, ONS, Population projections for NHS regions (release: 24 March 2020).

<sup>5</sup> For purposes of comparative analysis, we identify and sequence seven organisational groups: ambulance-, acute-, mental health- and community- trusts; systems; CCGs/CSUs; and ALBs/regulators. Our distribution aligns with the exception that Acutes are *over-* (47% vs predicted 35%) and CCGs *under-* represented by equivalent % (19% vs 31%). Data derives from earlier CHCR work to establish a 2017 baseline (NHS Confederation, Kings Fund and UK National Audit Office) with update from NHS Clinical Commissioners (1 April 2020).

<sup>6</sup> Within the United Kingdom, NHS structure aligns to the four nations. This study focuses on England.

<sup>7</sup> First news reports emerged from Wuhan, China – citing 59 cases of a ‘mystery pneumonia-like illness’ – on New Year’s Eve 2019. On March 11, the World Health Organisation (WHO) declared COVID-19 officially a pandemic. Three months later, amid falling infection and mortality rates, the UK Government began tentatively to ease its lockdown thereby bringing the first intense pandemic phase to a close. This study’s data collection ran Friday 22 May to Monday 8 June. Hence March 11-June 08 (approximately the 90-day peak phase for communicators).

<sup>8</sup> Nichols, B., Underwood, J and Hollings, J., (2020), *The Rapidly-Changing NHS: communication in the age of coronavirus*. CHCR: Great Missenden UK.

<sup>9</sup> This framework is a device only. The implied model and hypothesis set are not tested.

<sup>10</sup> Special thanks to Emily Loud, an NHS professional communicator and graduate of CHCR’s NHS postgraduate certificate in health communications now conducting research at the University of Cambridge, who had co-authored one of the literature reviews [3] and whose guidance proved invaluable.

<sup>11</sup> Based on prior literature, we designed these six individual items to capture in one aggregate scale, communicators’ overall state of preparedness for outbreak communications. In analysis, it passes the relevant construct reliability test: Cronbach’s  $\alpha = .836$  (vs. target  $> .700$  and only one ITC marginally below the  $.500$  line). Accordingly, we also report a single combined – or grand-mean – score for *Crisis-readiness*:  $2.92 = 48\%$ .

<sup>12</sup> Like much of this survey, the six *Crisis-readiness* items use five-part Likert scales. These score 1-5 (here from ‘not-at-all’ = 1 to ‘completely’ = 5). By extension we derive mean (or average) ratings for each item. Illustratively ‘horizon scanning’ reports a mean of 2.84. Finally, for accessibility and easy comparison throughout, we then compute and present each mean as a percentage (e.g.  $1.84/4.00 = 46\%$ ).

<sup>13</sup> UK Health Protection Agency, 8 January 2010.

<sup>14</sup> Based on correlation analysis. We adopt a conservative approach and, unless otherwise stated, only reference correlations – such as the three cited here - whose  $r$ -score achieves 0.01/99% significance.

<sup>15</sup> Based on linear regression. % explanation of variance is computed per usual practice by calculating  $r$ -squared. I.e. an  $r$  of 0.5 explains 25% of variance.

<sup>16</sup> Highest STD [ $\sigma$ ] of six = 1.05.

<sup>17</sup> Based on ranking 1-5 from which we derive means per option (e.g. public information = 1.84 before; 1.59 after). We then invert and re-compute these scores as accessible percentages (note 7).

<sup>18</sup> Per note 7 these are standard five-part Likerts, anchored ‘strongly disagree.... strongly agree. We again transform to 1-5 scores and re-compute as percentages. The collective average (or grand mean) is supplied although these three-items fall narrowly short of confirmed construct reliability.

<sup>19</sup> Extracted by exploratory factor analysis (EFA) of 17 items (QQ15.1-15.17). Designed to assess overall impacts, the EFA explains a healthy 66.87% of variance. This is based on a five-factor extraction (Table 14), labelled as follows: F1 = communications practice; F2 = national influence; F3 = management influence; F4 = public engagement; and F5 = communications outcomes.

**TABLE 14****Exploratory Factor Analysis - 17 Item Pandemic Communications Impacts (PCI) Scale**

	<b>F1</b>	<b>F2</b>	<b>F3</b>	<b>F4</b>	<b>F5</b>
	<b>Practice</b>	<b>NatInfluence</b>	<b>MgmtInfl</b>	<b>PubEngage</b>	<b>Outcomes</b>
061 F1 Practice-Access Aud (15.5)	0.563	-0.098	0.215	0.083	0.395
064 F1 Practice-Innovation(15.6)	0.770	0.106	0.099	0.084	0.143
065 F1 Practice-Results (15.7)	0.699	0.033	0.199	0.236	0.295
061 F1 Practice-Creative (15.8)	0.768	-0.025	0.145	0.195	0.173
071 F2 NatStrategy (15.13)	-0.070	0.819	0.015	0.131	0.198
072 F2 NatCommControl (15.14)	-0.049	0.884	-0.015	0.094	-0.003
073 F2 NatMessageControl (15.15)	0.144	0.850	-0.022	0.070	-0.173
074 F3 Mgmt - Involve (15.16)	0.518	0.021	0.554	-0.068	-0.150
075 F3 Mgmt -SMinfluence (15.17)	0.420	-0.021	0.652	0.258	0.010
060 F3 Mgmt-Dmaking (15.2)	0.118	-0.009	0.801	-0.052	0.251
061 F3 Mgmt-Approvals (15.3)	0.093	0.025	0.819	0.071	0.260
067 F4 PubEngage-Info (15.9)	0.192	-0.014	0.076	0.737	-0.092
068 F4 PubEngage-Assure (15.10)	0.048	0.120	0.127	0.788	0.184
069 F4 PubEngage-Bchange (15.11)	0.181	0.182	-0.094	0.673	0.191
070 F5 Outcomes Effectiveness (15.12)	0.365	-0.037	0.114	0.269	0.702
059 F5 Outcomes-Resources (15.1)	0.121	0.401	0.164	-0.263	0.484
062 F5 Outcomes Efficiency (15.4)	0.300	-0.010	0.303	0.203	0.708

Extraction Method: Principal Component Analysis.

Rotation Method: Varimax with Kaiser

Normalization.

Rotation converged in 7 iterations.

Source: Authors/SPSS output (12 June 2020)

Confirmation of **eigenvalues** -  $\geq 1$  explains *more* variance than a *single* observed variable – are set out at Table 15 together with the EFA's reported compliance with both KMO and Bartlett's test.

<b>TABLE 15: Comms Impact Scale - Initial Eigenvalues (<math>\lambda</math>)</b>			
Component	Total	% of Variance	Cumulative %
F1	5.124	30.142	30.142
F2	2.471	14.536	44.678
F3	1.667	9.805	54.483
F4	1.075	6.323	60.806
F5	1.031	6.068	66.873

**Confirmation of utility:**

(i) KMO test of sampling adequacy: .814 (vs threshold .500)

(ii) Bartlett test of sphericity: .000 (well within 0.05/95% line)

Source: SPSS output (12 June 2020)

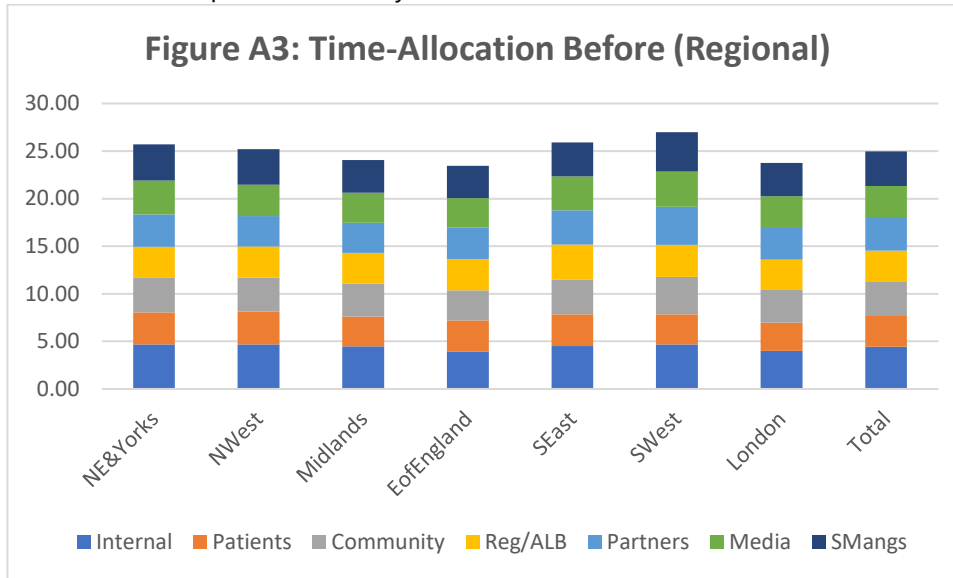
<sup>20</sup> For purposes of analysis we transform NHS banding to a fully numeric intervallic 1-13 scale i.e. 8a=8; 8b=9; VSM=13.

<sup>21</sup> Based on linear regression. 'Reassurance' reports a standardised **B** of .269, **p**= <.005/99%)

<sup>22</sup> *Audience* because *Public* here indicates 'general public' (or local 'population-at-large') while *Stakeholder* implies a specific strategic approach.

<sup>23</sup> We know the; (i) actual average hours worked during (51.38) and before (41.14 see S5); and (ii) mean % breakdown of time-before by audience. Next, we: (iii) calculate weights for perceived changes in time per audience during; (iv) apply them to the known increment; and finally (v) recompute overall percentages.

<sup>24</sup> Confirmation of pattern similarity.



<sup>25</sup> Excluding limited sample ALBs.

<sup>26</sup> For the purposes we exclude (i) the small-sample ALB/regulator and recently combined mental+community health trusts and (ii) all data points where the divergence (+/-) is <20%.

<sup>27</sup> The exceptions are Systems communicators who elevate high relative community commitment and reduce both partnership and senior management emphasis.

<sup>28</sup> Trude Arnesen of the Norwegian Institute for Public Health (cited in the Financial Times).

<sup>29</sup> In addition, it may be a concern for the CCGs in primary care. Their assessment of audience accessibility effectiveness declines marginally to 68.50% vs average 75.75%.

<sup>30</sup> Time-homeworking and (i) resource perceptions (-.200, 0.010/99%) and (ii) efficiency (-.167/.032/95%).

<sup>31</sup> Time-site-working and (i) resource perceptions (.173, 0.025/95%) and (ii) efficiency (-.199/.010/99%).

<sup>32</sup> National communications effectiveness and (i) hours before (-.341/.000/99%) and (ii) hours during (-.305/.000/99%). Conversely with

<sup>33</sup> Bivariate correlations (all weak) at 99%/0.01 significance.

<sup>34</sup> Sequence of linear regressions.

<sup>35</sup> Sequence of both bivariate correlations and linear regressions.

<sup>36</sup> Involvement  $r = .359$  and influence  $r = .490$ , both sig = .000/99%.

<sup>37</sup> Linear regression sequence.

<sup>38</sup> Bivariate correlation sequence.

<sup>39</sup> See also note vii. Like the six-item *Crisis-Readiness*, the four item *Relationships* scale also passes the construct reliability test ( $\alpha = .747$ , vs threshold .700). The enables computation and reporting of a grand mean (64.66).

<sup>40</sup> Of the eight bivariate correlations referenced here, one is at 0.05/95% as opposed to the 0.01/99% level.

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<sup>41</sup> See note 9.

<sup>42</sup> Most notably with attempted local message control (-211, .006/99%).

<sup>43</sup> (.157, .05, 95% significant)

<sup>44</sup> See also note 5. The continuum (tested separately in another CHCR study) predicates a provider-2-commissioner continuum through which organisational approach modulates progressively. Its value in correlation analysis is further demonstrated here.

<sup>45</sup> Via exploratory factor analysis (EFA), using initially here PCA and Varimax rotation, we extract five factors which pass both KMO and Bartlett tests. Collectively the five explain 66.87% of variance (70% generally being considered particularly good in social science research).

<sup>46</sup> Based on five linear regression analyses. Only regression weights exceeding .005/95% significance reported.

<sup>47</sup> The distinction is between the realist-teleological and phenomenological. Conceptually the distinction is well clarified by applying Habermas' discussion of capacities for "decentred perception and manipulation of things and events on the one hand" (communications) and for "reaching intersubjective understanding of things and events on the other" ['engagement', 44,p14].