

**P6 – Infringement and Validity of UK Patents
Mark Scheme 2014**

Assessment Task Outline

Your task is to read the Client’s letter and the accompanying documents and then to prepare a memorandum in advance of the meeting suggested in the client’s letter.

Your memorandum should include notes on infringement and validity **in the UK only** and further notes on possible steps to be taken to help your client.

Marks for conclusions cannot be awarded without supporting reasoning or basis for those conclusions. e.g. putting a tick alone to say a feature is present will not be awarded a mark.

If candidates do not demonstrate and apply their conclusions and/or analysis consistently between sections of the paper, full marks cannot be awarded.

The mark scheme is indicative of the marks that can be awarded however a candidate who makes relevant points which are equivalent to those in the mark scheme can be awarded a mark.

Answer

**CONSTRUCTION
CLAIM 1**

A heat absorbing panel	A panel suitable for use as a wall/floor/ceiling tile. Capable of absorbing heat energy from its surroundings	0.5
The panel comprising a first part and a second part	Comprising – not limited Two distinct parts or a convenient way of describing two opposed/matched parts. Prefer former - see page 9 line 11-15	0.5 0.5
Which are secured together at their peripheries	As above, peripheral portions engaged in a sealing fashion (see line 30-32 of page 10)	1
The two parts defining a cavity there between	A cavity is provided when the two parts are joined together	0.5

The cavity retaining a body comprising a wax-based phase change material	'A body' 'comprises' a phase change material (PCM) wax-based PCM. Suitable for use to absorb heat from room (limit of melting point?)	1 1
Characterised in that		0
A heat conducting material is located within and extends across the cavity to seal in the phase change material	Heat conducting material – relatively more heat conducting than PCM Located within cavity Extends across – entirety? Extends across to Seal In?	1 1 1 1
Total		9 marks

CLAIM 2

A panel according to claim 1	Claimed panel has all the features of claim 1, plus the following.	0.5
The body comprising the phase change material comprises	The body... 'comprises'	1
A first PCM having a melting point between 5 to 40 Celsius	Range of temperatures (literal or figurative) and significant figures	1
And a second PCM having a melting point between 20 to 45 Celsius	Range of temperatures Does first and second PCM need to be different? (overlapping ranges)	0.5 1
Total		4 marks

CLAIM 3

A panel according to claim 2	A panel having all the features of claim 1 and claim 2, plus the following;	0.5
Wherein the heat conducting material separates the first and second wax PCM	Separates Wax – lack of antecedence? Wax vs wax based in claim 1	1 1
Total		2.5 marks

CLAIM 4

A panel according to claim 1, 2 or 3	The following features, appended to claim 1, or claims 1+2, or claims 1+2+3. Claims 1 + 3 is not possible.	0.5
Wherein the heat conducting material comprises elongate members	Elongate Members – plural?	1 1
Which extend into the phase change material	Extend into (the body?) Dependency on Claim 2 and 3, which PCM or any of them	1 2
Total		5.5 marks

CLAIM 5

A panel according to claim 1	Having all the features of claim 1, and the following.	0.5
Wherein a thermal bridge is provided between the first part and the heat conducting material	Thermal bridge (is elongate member part of heat conducting material) Between	1.5 1
Total		3 marks

CONSTRUCTION TOTAL: 24 marks

INFRINGEMENT

Candidate must provide a reference to the actual 'infringing' product and make reference to the relevant part of the disclosure. Otherwise marks will not be awarded for indicating that a feature is present (without indicating where).

What is the infringing activity	Reference p.6 and table 1	1
Total		1 mark

CLAIM 1

A heat absorbing panel	Feature present- ceiling tile (CT) p.6, line.6 (or line 20 page 4)	0.5
The panel comprising a first part and a second part	Feature present line 11to 14 of page 5, or figure 3 and table 1 line 2	1
Which are secured together at their peripheries	Feature present – line 13-14 of page 5, or figure 3 and table 1 line 2 (not figure 3 or 3a in isolation)	1
The two parts defining a cavity therebetween	Feature present – cavity, V line 40 page 4, or table 1 line 3	1
The cavity retaining a body comprising a wax-based phase change material	Feature present – PCM1, PCM2table 1	1
A heat conducting material is located within and extends across the cavity to seal in the phase change material	Feature present - sheet part S, wall parts W Fluid tight compartments	1 1
Conclusion	INFRINGED	0.5
Total		7 marks

CLAIM 2

A panel according to claim 1	Present	0.5
The body comprising the phase change material comprises	Feature present, table 1	0.5
A first PCM having a melting point between 5 to 40 Celsius	Feature present, PCM2 - line 16 page 6 (NB the construction must be consistent with the point made to gain the mark)	1
And a second PCM having a melting point between 20 to 45 Celsius	Feature present PCM1 – line 15 page 6 (NB the construction must be consistent with the point made to gain the mark)	1
Conclusion	INFRINGED	0.5
Total		3.5 marks

CLAIM 3

A panel according to claim 2	Present	0.5
Wherein the heat conducting material separates the first and second wax PCM	Present, divider M figure 3 Divider separates the PCMs	0.5 0.5
Conclusion	Infringed	0.5
Total		2 marks

CLAIM 4

A panel according to claim 1, 2 or 3	Present	0.5
Wherein the heat conducting element comprises elongate members	Present, Upper and lower wall parts W1, W2 Elongate	0.5 1
Which extend into the phase change material	Feature present	1
Conclusion	INFRINGED per all dependencies	0.5
Total		3.5 marks

CLAIM 5

A panel according to claim 1	Present	0.5
Wherein a thermal bridge is provided between the first part and the heat conducting material	Present - Wall part W1 extends into trench figure 3, table 1 Function of thermal bridge and what is it between p.5 line 22-24	1 1
Conclusion	INFRINGED	0.5
Total		3 marks

INFRINGEMENT TOTAL: 20 marks

NOVELTY

Docs C and D fully available as prior art. (no marks awarded for noting this)

CLAIM 1

	C		D	
A heat absorbing panel	Feature present. Retile is a ceiling tile – line 16 pg 14	0.5	Feature present (p18, line 32)	0.5
The panel comprising a first part and a second part	Feature present. – see figure A	0.5	Feature present – see line 9 of page 19	0.5
Which are secured together at their peripheries	Feature may be present (p14, line 16). Depends on construction as to ‘secured’ but PCMs are sealed in bags.	1	Feature presumably present – complete panel (Fig 3C)	0.5
The two parts defining a cavity therebetween	Feature present see Figure A	0.5	Feature present (Figure 3C) – PCM is held between parts.	0.5
The cavity retaining a body comprising a wax phase change material	Feature present (p14, line 16 - 17).	0.5	Feature absent – Glauber salts are said to be distinct from waxes (see line 16 of page 16)	1
A heat conducting material is located within and extends across the cavity to seal-in the PCM	On balance - Feature present – PCM in plastic bags which are not likely to be considered relatively thermally conducting. Eg line 24 page 14 but are certainly not heat insulating	1	Sheath of fibre is heat conducting (p18, line 16 to 17); fibre extends across cavity (figure 3C) – feature present seals in PCM 14	2
Conclusion	Claim new (or old depending on plastic bag/heat conduct) point	0.5	Claim new	0.5
Total				10 marks

CLAIM 2

A panel according to claim 1	Claim 1 not satisfied/not satisfied,		Claim 1 new...	
The body comprising the phase change material comprises	Present (Figure A)	0.5	Present (Figure 3C)	0.5
A first PCM having a melting point of from 5 to 40 Celsius	Present (Room Temp) (page 14, line 10 – intrinsic?)	0.5	Presumably the PCM has a melting point at room Temp – feature present (page 18, line 32 to 40).	0.5
And a second PCM having a melting point of from 20 to 45	May be present (page 14, line 10 – intrinsic?)	0.5	May be present depending on construction (page 18, line 33: particles	0.5

Celsius			1) – The particles/fibres are formed from the same Glauber salt PCM.	
Conclusion	Claim 2 is old/new	0.5	Claim 2 may be in its own right as well as by dependency.	0.5
Total				4 marks

CLAIM 3

A panel according to claim 2	Not satisfied, satisfied		Claims 1 and 2 are new...	
Wherein the heat conducting material separates the first and second wax PCM	Construction of heat conducting member (is plastic bag a heat conductor) (page 14, line 19 – 20)	0.5	Heat conducting member (eg sheath) does separate PCM in particle from PCM in fibre. Not present – Glauber salts not wax.	1 0.5
Conclusion	Claim old/new	0.5	Claim 3 new in its own right, and by dependency	0.5
Total				3 marks

CLAIM 4

A panel according to claim 1, 2 or 3	Not satisfied/satisfied		Claims 1, 2 and 3 new.	
Wherein the heat conducting material comprises elongate members	Yes/No heat conducting material (plastic bag? P14, line 19), no elongate members	0.5 0.5	Is each portion of the fibre 14 an elongate member (page 18, line 29 – 30) or a single elongate member	1
Which extend into the phase change material	Feature absent	0.5	Feature present? Fibre runs through PCM (Figure 3C)	0.5
Conclusion	Claim 4 new	0.5	Claim 4 may be new in its own right and is new by dependency	0.5
Total				4 marks

CLAIM 5

A panel according to claim 1	Not satisfied		Claim 1 new.	
Wherein a thermal bridge is provided between the first part and the heat conducting material	Yes/No thermal bridge depending on construction and view of plastic bag.	1	Does protruding portion of fibre provide thermal bridge (Figure 3c, and page 19, line 11 - 12)	1
Conclusion	Claim 5 may be new in its own right and by dependency.	0.5	Claim 5 may be new in its own right and by dependency.	0.5
Total				3 marks

NOVELTY TOTAL: 24 marks

INVENTIVE STEP

Pozzoli/Windsurfer approach:

PSA is manufacturer/designer of 'wall panels for regulating heat', specifically for use in buildings? For internal use – see title of doc C and comment of client?

CGK of PSA? Wall panels, different types of PCM – details of Document C ('everyone reads it from cover to cover') 2 marks for properly defined PSA and CGK.

Document D seems to be the most sensible starting point for an inventive step assessment (however, marks will be awarded for appropriate inventive arguments starting from Document C).

Claim 1

Feature missing from Doc D is wax in place of Glauber salt. Doc D states that they are the same and that both have been used.

Doc C states that waxes are cheaper than other types of PCM.

Is it a routine matter to change Glauber salts to waxes, given the manufacturing process disclosed? – waxes may make panel cheaper.

Claim 1 is not inventive.

Claim 2

Above arguments apply equally to claim 2. If Claim interpreted as being different waxes then Doc C provides rationale for using two distinct types (recycled and virgin). Claim temperature ranges both incorporate room temperature.

Claim not inventive.

Claim 3

Comments re Claim 2 equally apply here as well, as well as discussion of use of different wax materials from Document C depending on construction.

Claim not inventive.

Claim 4

Depending on construction Claim may be obvious. Does Doc D disclose elongate members? Is it obvious to make a mat out of plural fibres?

If not, claim may be inventive.

Claim 5

Probably obvious depending on construction - depending on construction of Claims 1 and 5.

Claim	PSA	1	2	3	4	5
Marks	2	5	3	3	3	2

INVENTIVE STEP TOTAL: 18 marks

SUFFICIENCY

Page 10, line 11, 16 and 18 – second phase change material should be 33.

1 mark

Not insufficient because correction of obvious errors?

1 mark

SUFFICIENCY TOTAL: 2 marks

AMENDMENT

Sensible supported suggestions will be awarded marks.

Possible amendment to state 'heat conducting member is a flat sheet' etc – see line 29 to 30 page 8 of Document B (as to effect see Advice section).

AMENDMENT TOTAL: 2 marks

ADVICE

One mark per point, up to a maximum of 10 marks. Other reasonable points will attract marks.

- a) Document B is in force and so owner could commence litigation as soon as offer or actual sale made straight away.
- b) Interim injunction may be difficult to resist as client has not started sale (has patentee sold product?).
- c) S.64 not available – did not commence working invention before priority date.
- d) Client knows about patent.
- e) Document B is in opposition period – balance between seeking Revocation and Opposition (stay?).
- f) Claims are infringed (remedies and advice to stop).
- g) IPO/Patent Office opinion where good reason for seeking an opinion is provided.
- h) Claims are probably invalid – however, saving amendment will still be infringed.
- i) Client's device may be independently patentable re heat insulating layer on divider – cross licence/negotiation.
- j) Potential design rounds particularised and discussed e.g. Use of Glauber salts but note expense.
- k) Should explain to client that first to invent is not relevant.

No marks awarded for checking renewals or suggesting additional searches.

ADVICE TOTAL: 10 marks

TOTAL MARKS: 100 marks