### CPC COOPERATIVE PATENT CLASSIFICATION

### A HUMAN NECESSITIES

### PERSONAL OR DOMESTIC ARTICLES

mechanism}

# A47 FURNITURE; DOMESTIC ARTICLES OR APPLIANCES; COFFEE MILLS; SPICE MILLS; SUCTION CLEANERS IN GENERAL

(NOTE omitted)

## A47C CHAIRS (seats specially adapted for vehicles <u>B60N 2/00</u>); SOFAS; BEDS (upholstery in general <u>B68G</u>)

### **WARNINGS**

The following IPC groups are not in the CPC scheme. The subject matter for these IPC groups is classified in the following CPC groups:
 A47C 23/053
 Covered by
 A47C 23/05, A47C 23/0507, A47C 23/0515

2. In this subclass non-limiting references (in the sense of paragraph 39 of the Guide to the IPC) may still be displayed in the

Chairs; Stools; Benches		1/0307	• • • • {adjustable rectilinearly in horizontal
1/00	Chairs adapted for special purposes (features relating to vertical adjustability A47C 3/20; convertible chairs A47C 13/00; chairs or personal conveyances specially adapted for patients or disabled persons A61G 5/00; operating chairs, dental chairs	1/0308 1/031 1/032	<ul> <li>direction}</li> <li>direction}</li> <li>dijustable by rotation}</li> <li>having coupled {concurrently} adjustable supporting parts</li> <li>the parts being movably-coupled seat and backrest (A47C 1/035 takes precedence)</li> </ul>
1/02	<ul><li>A61G 15/00)</li><li>Reclining or easy chairs (supports for parts of body A47C 7/36, A47C 7/50, A47C 7/54)</li></ul>		<ul><li> {having adjustable and lockable inclination}</li><li> {by electric motors}</li></ul>
1/022	having independently-adjustable supporting parts		• • • • {by fluid means}
1/023	• • • the parts being horizontally-adjustable seats		• • • • {by means of screw-and-nut mechanism}
	{; Expandable seats or the like, e.g. seats with		• • • • {by chains, ropes or belts}
	horizontally adjustable parts}	1/03233	• • • • {by means of a rack-and-pinion or like
1/024	<ul> <li>the parts, being the back-rest, or the back-rest and seat unit, having adjustable {and lockable} inclination</li> </ul>	1/03238	gearing mechanism} {by means of peg-and-notch or pawl-and-ratchet mechanism}
1/0242	• • • {by electric motors}	1/03244	• • • • • {positioned under the arm-rests}
1/0244	• • • {by fluid means}	1/0325	• • • • {by means of clamps or friction locking
1/0246	• • • {by means of screw-and-nut mechanism}		members}
1/0248 1/025	<ul><li> {by chains, ropes or belts}</li><li> by means of a {rack-and-pinion} or like</li></ul>	1/03255	• • • { with a central column, e.g. rocking office chairs}
1/023	gearing mechanism	1/03261	{characterised by elastic means}
1/026	by means of peg-and-notch or {pawl-and-	1/03266	• • • • {with adjustable elasticity}
	ratchet} mechanism	1/03272	• • • • {with coil springs}
1/0265	• • • • {positioned under the arm-rests}	1/03274	• • • • {of torsion type}
1/027	by means of clamps or friction locking	1/03277	• • • • {with bar or leaf springs}
	members		• • • • • {of torsion type}
1/028	for changing a straight chair into an easy chair		• • • • {with fluid springs}
	{, e.g. by inverting or tilting seat and back-rest		• • • • {with resilient blocks}
	in the base frame or by overturning the whole chair}	1/03294	• • • { slidingly movable in the base frame, e.g. by rollers }
1/029	• • • by changing the length or the inclination of	1/033	the coupling member being a flexible strip
	the legs {(varying the height of a seat by inclining the legs <u>A47C 3/36</u> )}	1/034	the parts including a leg-rest or foot-rest (A47C 1/037 takes precedence)
1/03	• the parts being arm-rests {(conversion into a bed A47C 17/12)}	1/0342	• • • {in combination with movable backrest-seat unit or back-rest}
1/0303	• • • {adjustable rectilinearly in vertical direction}	1/0345	{characterised by foot-rests actuated by
1/0305	{by peg-and-notch or pawl-and-ratchet		lazy-tongs}

1 /02 47		2/04	C. 1.11 1 ' N .' 1 '
1/0347	• • • • • {characterised by the backrest-seat unit or back-rest slidingly movable in the base	3/04	Stackable chairs; Nesting chairs  (with timing up and to)
	frame, e.g. by rollers}	3/045	• • {with tipping-up seats}
1/035	in combination with movably coupled seat	3/12	<ul> <li>with shell-shape seat and back-rest unit, e.g. having arm rests</li> </ul>
1/033	and back-rest, {i.e. the seat and back-rest	3/14	of asymmetrical shape
	being movably coupled in such a way that	3/14	<ul> <li>of asymmetrical shape</li> <li>of legless type, e.g. with seat directly resting on</li> </ul>
	the extension mechanism of the foot-rest is	3/10	the floor (A47C 3/14 takes precedence; detachably
	actuated at least by the relative movements		mounted on stadium benches A47C 1/16; children's
	of seat and backrest}		chairs mounted on back-rest of chair A47D 1/10 {,
1/0352	{characterised by coupled seat and back-		legless beach chairs A47C 1/146; inflatable chairs
	rest slidingly movable in the base frame,		A47C 4/54}); Hassocks; Pouffes
1/0255	e.g. by rollers}	3/18	• Chairs or stools with rotatable seat (adjustable in
1/0355	actuated by linkages, e.g. lazy-tongs mechanisms	2/105	height by rotation A47C 3/24)
1/036	the parts including a head-rest	3/185	• { self-returning to the original position}
1/037	in combination with a leg-rest or foot-rest	3/20	• Chairs or stools with vertically-adjustable seats
1/04	Hairdressers' or similar chairs {, e.g. beauty salon	3/22	(tables with variable height A47B 9/00)
1,01	chairs}	3/24	<ul><li>with balancing device, e.g. by spring, by weight</li><li>with vertical spindle</li></ul>
1/06	adjustable	3/245	{resiliently supported}
1/08	with auxiliary seats (insertable seats for children	3/243	<ul><li>with vertical, {or inclined} toothed rack; {with</li></ul>
	<u>A47C 1/11</u> )	3/20	peg-and-notch mechanism}
1/10	with head-rests; with paper holders	3/265	• • { with rack-and-pinion gearing }
1/11	Accessories not otherwise provided for, e.g. seats	3/28	with clamps acting on vertical rods
	for children	3/285	{with radially expansible clamping elements
1/12	Theatre, auditorium, or similar chairs (seats)		telescopically engaged in a tube or the like}
	{detachably mounted on} stadium benches	3/30	<ul> <li>with vertically-acting fluid cylinder</li> </ul>
1/121	A47C 1/16)	3/32	with flexible height-adjusting means, e.g. rope,
1/121	<ul><li>having tipping-up seats</li><li>tipping-up sideways</li></ul>		chain
1/124	<ul><li> tipping-up sideways</li><li> Separate chairs, connectible together into a row</li></ul>	3/34	• • with pins coacting with holes {or bolt-and-nut
1/124	stowable in floor or wall	2/26	adjustment}
1/13	. Indicators; Devices for reserving or the like	3/36	<ul> <li>with means, or adapted, for inclining the legs of the chair or stool for varying height of seat</li> </ul>
	{(coin-freed apparatus for seats or footstools	3/38	• with additional seat or additional legs for varying
	<u>G07F 17/08</u> )}	3/30	height of seat
1/14	• Beach chairs {; Chairs for outdoor use, e.g. chairs	3/40	Telescopic guides
	for relaxation or sun-tanning}	4/00	Foldable, collapsible or dismountable chairs (of
1/143	• {Chaise lounges}	7/00	tubular metal type <u>A47C 5/10</u> ; children's foldable
1/146 1/16	<ul><li>. {of legless type}</li><li>. {Chairs or} seats detachably mounted on stadium</li></ul>		chairs A47D 1/02)
1/10	benches (detachably mounted children's chairs	4/02	Dismountable chairs
	A47D 1/10)	4/021	• • {connected by slotted joints}
		4/022	• • {connected by bars or wires}
3/00	Chairs characterised by structural features;	4/024	• • {having integral back-rest and rear leg}
	Chairs or stools with rotatable or vertically- adjustable seats (A47C 1/00, A47C 4/00 take	4/025	<ul> <li>{having integral back-rest and front leg}</li> </ul>
	precedence)	4/027	• • {having integral seat and rear leg}
3/02	• Rocking chairs (specially for children A47D 13/10)	4/028	• • {Upholstered chairs, e.g. metal, plastic or wooden
3/021	having elastic frames		chairs}
3/023	made of tubular material	4/03	• Non-upholstered {chairs, e.g. metal, plastic or}
3/025	• • with seat, or seat and back-rest unit elastically {or	4/04	wooden chairs
	pivotally} mounted in a rigid {base} frame	4/04 4/045	<ul><li>Folding chairs with inflexible seats</li><li>• {foldable side to side only}</li></ul>
3/0251	• • {driven by electric motors}	4/043 4/06	<ul> <li>• {foldable side to side only}</li> <li>• Attachment of upholstery or fabric to frames (in</li> </ul>
3/0252	• • • {connected only by an elastic member	4/00	general A47C 31/02)
	positioned between seat and base frame}	4/08	having a frame made of wood or plastics
3/0255	• • • {pivotally mounted in the base frame, e.g.	4/10	with legs pivotably connected to seat or
3/0257	swings } {slidingly movable in the base frame, e.g. by		underframe
3/0237	rollers}	4/12	• • • of adjustable type (A47C 4/14 takes
3/026	• • • with central column, e.g. rocking office chairs;		precedence)
	Tilting chairs	4/14	with cross legs
3/027	with curved rocking members between seat and	4/16	of adjustable type
	{base} frame	4/18	having a frame made of metal
3/029	with curved rocking members resting on the floor	4/20	with legs pivotably connected to seat or underframe
3/03	. Locking members ( <u>A47C 3/027</u> takes precedence)		undername

4/22	• • • of adjustable type ( <u>A47C 4/24</u> takes	7/024	• • {with double seats}
	precedence)	7/025	• • {Springs not otherwise provided for in
4/24	with cross legs	T/025	<u>A47C 7/22</u> - <u>A47C 7/35</u> }
4/26	of adjustable type	7/027	• • • {with elastomeric springs (A47C 7/282 takes
4/28	Folding chairs with flexible coverings for the seat or back elements	7/028	<ul><li>precedence)}</li><li>• { with wooden springs, e.g. slated type}</li></ul>
4/283	• {foldable side to side only}	7/028	<ul><li>• { with wooden springs, e.g. stated type}</li><li>• { of non-adjustable shape adapted to a user</li></ul>
4/286	<ul><li>. {foldable side to side only}</li><li>. {foldable side to side and front to back, e.g.</li></ul>	1/029	contour or ergonomic seating positions}
4/200	umbrella type}	7/14	• of adjustable shape; elastically mounted {;
4/30	Attachment of upholstery or fabric to frames (in)	//14	adaptable to a user contour or ergonomic seating
4/30	general A47C 31/02)		positions (movably-coupled seat and backrests
4/32	having a frame made of wood or plastics		with elastic adjustment means A47C 1/03261;
4/34	with legs pivotably connected to seat or		elastically-mounted back-rests or backrest-seat
	underframe		units in the base frame $\underline{A47C7/44}$ )
4/36	of adjustable type (A47C 4/38 takes	7/142	• • {by fluid means}
	precedence)	7/144	• • { with array of movable supports}
4/38	with cross legs	7/16	Seats made of wooden, plastics, or metal sheet
4/40	of adjustable type		material; Panel seats
4/42	having a frame made of metal	7/18	having foamed material included in cushioning
4/44	with legs pivotably connected to seat or	=40=	part (foamed material mattresses <u>A47C 27/14</u> )
	underframe	7/185	• • • {with a stiff, rigid support}
4/46	• • • of adjustable type ( <u>A47C 4/48</u> takes	7/20	with reinforcement {in the foam layer}
	precedence)	7/22	• Straps or the like for {direct user support or for}
4/48	with cross legs	7/24	Carrying upholstery
4/50	of adjustable type	7/24	<ul> <li>Upholstered seats (A47C 7/18 takes precedence)</li> <li>with reinforcement {of the external layer of the</li> </ul>
4/52	• Trunk chairs, i.e. chairs collapsible to {self	7/26	upholstery, e.g. vandal resistant}
	contained carrying case, e.g.} trunk shape (trunk	7/28	<ul> <li>with tensioned springs, e.g. of flat type</li> </ul>
1/51	tables A47B 3/10)	7/282	• • • {with mesh-like supports, e.g. elastomeric
4/54	<ul> <li>Inflatable chairs (connection of valves to inflatable elastic bodies <u>B60C 29/00</u>)</li> </ul>	1/202	membranes}
	elastic bodies <u>Booc. 25/00</u> )	7/285	• • • {with metal strips or webs}
5/00	Chairs of special materials	7/287	• • { with combinations of different types flat type
5/005	• {of paper, cardboard or similar pliable material}		tensioned springs}
5/02	• {of woven material, e.g.} basket chairs	7/30	• • • with springs meandering in a flat plane
5/04	<ul> <li>Metal chairs, e.g. tubular (of rocking type</li> </ul>	7/32	• • with tensioned cords, e.g. of elastic type, in a
	A47C 3/023; of non-tubular folding, collapsible, or		flat plane
5 /0 <b>/</b> 0	dismountable type <u>A47C 4/00</u> )	7/34	• with springs in compression, e.g. coiled
5/043	• • {of tubular non-circular cross-section}	7/342	• • {Edge stiffeners}
5/046	• {of non-tubular cross-section}	7/345	• • • {of adjustable resilience}
5/06	Special adaptation of seat upholstery or fabric for attachment to tubular chairs	7/347	• • { with means for connecting springs to each
5/08	Tubular chairs having sheathed tubes; Adaptation		other or to seat frame}
3/08	of sheathed tubes thereto	7/35	Combinations of different types of springs;
5/10	Tubular chairs of foldable, collapsible, or		Adjustable springs; Attachment of springs to
5/10	dismountable type		other springs or to {the base} frame {; Springs for seat parts not provided for in other groups of this
5/12	• of plastics, with or without reinforcement		subclass}
5/125	• • {completely made of foam material}	7/36	• Support for the head or the back
5/14	• characterised by the use of laminated wood	7/38	for the head {(adjustable coupled to reclining or
	•	1130	easy chairs A47C 1/036)}
7/00	Parts, details, or accessories of chairs or stools	7/383	• • • {Detachable or loose head- or neck-supports,
<b>5</b> /00 <b>2</b>	(attaching to floor A47B 91/08)	7,000	e.g. horse-shoe shaped}
7/002	• {Chair or stool bases ( <u>A47C 3/20</u> takes	7/386	{Detachable covers for headrests}
7/004	precedence)}	7/40	• • for the back
7/004	<ul> <li>• {for chairs or stools with central column, e.g. office chairs}</li> </ul>	7/402	• • • {adjustable in height}
7/006	• {with castors}	7/405	• • • {with double backrests}
7/008	<ul><li>. {with castors}</li><li>. {for uneven surfaces}</li></ul>	7/407	• • · · {of collapsible type}
7/008	<ul><li>. {for uneven surfaces}</li><li>. Seat parts (adaptation of seats to mounting in</li></ul>	7/42	of detachable {or loose} type
1102	tubular chairs <u>A47C 5/06</u> ; such parts not restricted	7/425	{Supplementary back-rests to be positioned
	to chairs A47C 23/00; removable upholstered units		on a back-rest or the like}
	or cushions <u>A47C 27/00</u> )	7/44	with elastically-mounted {back-rest or
7/021	• • {Detachable or loose seat cushions}		backrest-seat unit in the base} frame
7/0213	{detachably secured to seats, e.g. by ties or	7/441	• • • { with adjustable elasticity }
	hook and loop straps}	7/443	• • • { with coil springs }

5/444		7/746	
7/444 7/445	<ul><li> {of torsion type}</li><li> {with bar or leaf springs}</li></ul>	7/746	• • • • {without active means, e.g. with openings or heat conductors}
7/4454	• • • {with our or real springs} • • • • { of torsion type }	7/748	• • • • {for heating}
7/446	• • • {with fluid springs}	0/00	
7/448	• • • {with resilient blocks}	9/00	<b>Stools for specified purposes</b> (with rotatable seats A47C 3/18; with vertically adjustable seats
7/46	• • • with special, e.g. adjustable {, lumbar region		A47C 3/20 {; other seating furniture for specified
	support} profile; "Ackerblom" profile chairs		purposes <u>A47C 15/004</u> }; footstools <u>A47C 16/02</u> ;
7/462	{adjustable by mechanical means}		prayer stools A47C 16/04; platforms or seat-boxes
7/465	{by pulling an elastic cable}		specially adapted for angling A01K 97/22)
7/467 7/48	<ul><li> {adjustable by fluid means}</li><li> of freely-rotatable type</li></ul>	9/002	• {with exercising means or having special
7/48 7/50	Supports for the feet or the legs {coupled to fixed	0/005	therapeutic or ergonomic effects}
1/30	parts of the chair (coupled to other adjustable	9/005	<ul> <li>• { with forwardly inclined seat, e.g. with a knee- support}</li> </ul>
	parts {of the reclining or easy chair} A47C 1/034,	9/007	• {High stools, e.g. bar stools (children's high chairs
	A47C 1/037; {stand-alone rests or supports for the		A47D 1/00)}
	feet or the legs, e.g.} footstools <u>A47C 16/02</u> )	9/02	• Office stools {not provided for in main groups
7/503	• • {with double foot-rests or leg-rests}		<u>A47C 1/00</u> , <u>A47C 3/00</u> or <u>A47C 7/00</u> }; Workshop
7/506	• • {of adjustable type}		stools
7/5062	· · · {rectilinearly}	9/022	• • {movably mounted on a working-table or the like
7/5064	{in vertical direction}	0/025	(for hairdressers A47C 1/08))
7/5066 7/5068	<ul><li> {by rotation}</li><li> {actuated by linkages}</li></ul>	9/025	• • {Stools for standing or leaning against, e.g. in a semi-standing or half-seated position}
7/5008	{actuated by mixages} of detachable type	9/027	{Stools for work at ground level}
7/54	Supports for the arms	9/04	<ul> <li>Milking stools</li> </ul>
7/541	• • {of adjustable type (adjustable arm-rests of	9/06	• Wall stools {; Stools hingedly mounted against the
	reclining or easy chairs A47C 1/03)}		wall}
7/543	• • {movable to inoperative position}	9/08	• Music stools
7/546	• • {of detachable type}	9/10	<ul> <li>Camp, travelling, or sports stools (walking sticks)</li> </ul>
7/56	<ul> <li>Parts or details of tipping-up chairs, e.g. of theatre chairs</li> </ul>		or umbrellas convertible into seats, hunting sticks A45B 5/00)
7/563	• • {provided with a back-rest moving with the seat}	9/105	• • {having several foldable or detachable legs
7/566	• • {Resiliently mounted seat or back-rest}		converging in one point}
7/58	• Hinges, e.g. for mounting chairs in a curved row (hinges for wings in general <u>E05D</u> )	11/00	Benches not otherwise provided for (school forms A47B 39/00)
7/60	Use of locks or ledges for limiting the seat	11/005	• {having multiple separate seats}
	movement {(coin-freed apparatus for seats or footstools <u>G07F 17/08</u> )}	11/02	<ul> <li>Church benches; Confessionals</li> </ul>
7/62	Accessories for chairs	12/00	Step-stools
7/622	• • {Receptacles, e.g. cup holders, storage	,	NOTE
	containers}		
7/624	• • {located on side of seat, e.g. on armrest}		Folding or collapsing actions, of interest apart from any conversion between the step and seat
7/626	• • • {directly under the seat}		functions, are classified in group A47C 4/00
7/628	• • • {accessible by displacement of seat}		
7/64	Hat or coat holders	12/02	<ul> <li>requiring conversion between the step and seat</li> </ul>
7/66	Means to protect against weather		functions
7/664	• • { of umbrella type }	13/00	Convertible chairs, stools or benches (step-stools
7/666 7/68	<ul><li> {of enclosure type with side panels}</li><li>. Arm-rest tables {; or back-rest tables}</li></ul>		requiring conversion between the step and seat
7/70	• • • of foldable type		functions <u>A47C 12/02</u> )
7/705	{of detachable type}	13/005	• {Modular seating (chairs connectible into a row
7/72	. Adaptations for incorporating lamps, radio sets,		<u>A47C 1/124</u> )}
	bars, telephones, ventilation, heating or cooling	15/00	Other seating furniture (school forms A47B 39/00)
	arrangements or the like	15/002	• {Corner seating furniture, e.g. corner sofas
7/723	• • { with display screens }		(changing corner couches into double bed
7/725	• • • {for illumination, e.g. lamps}	15/004	<u>A47C 17/36</u> )}
7/727	• • {with speakers}	15/004	• {Seating furniture for specified purposes not
7/74	for ventilation, heating or cooling {(actuated by	15/006	<ul> <li>covered by main groups <u>A47C 1/00</u> or <u>A47C 9/00</u>}</li> <li>• (Floating seats (floatable vessel furniture for life-</li> </ul>
7/742	rocking the chair A47C 3/02)} {for ventilating or cooling (A47C 31/116)	13/000	saving B63C 9/30)}
1/144	takes precedence)}	15/008	• • {for sexual intercourse}
7/744	• • • • { with active means, e.g. by using air		,
	blowers or liquid pumps}		

16/00	{Stand-alone} rests or supports for feet, legs, arms,	17/2073	• • • • {by sliding forward}
10/00	back or head (associated with chairs A47C 7/00;	17/2076	{by lifting or tilting}
	associated with beds or sofas A47C 20/00)	17/213	• • • • • (e) finding of titing; • • • • • the surface, when used for lying down {in a
16/005	• {Back-rests}		bed position}, consisting of one side of the
16/02	Footstools; Foot-rests; Leg-rests		{seating furniture} seat frame and the back-
16/025	• • {adjustable, swivelling, rocking}		rest frame
16/04	Prayer-stools; Kneeling stools; Kneeling supports	17/22	• • {Seating furniture having non-movable back-rest
	(hassocks or pouffes A47C 3/16)		changeable to beds} with means for uncovering a
			previously hidden mattress or similar bed part
Sofas; Beds		17/225	• • • {with hidden separate full size mattress frame
<b>NOTE</b>		17/23	unfolded out of the base frame} the lying down {bed} surface partly consisting
In groups	A47C 17/00 - A47C 27/00, the following terms or	17/23	of one side of the seat
	as are used with the meaning indicated:	17/24	with only one movable part being tiltable about
	ad" is used only for the frame of a bed;		a horizontal axis
	ncludes bedsteads combined with spring mattresses,	17/26	tiltable to an overturned position
	mattresses, or similar means to enable the lying of sthereon;	17/28	• • • having means to lift the tilting axis
•	mattresses" do not include any stuffed material;	17/30	• • • two or more parts being rotatable about a
	d mattresses" may include metal springs.		vertical axis
	, , ,	17/32	Changing a single bed into a double bed by
17/00	Sofas; Couches; Beds (bedsteads A47C 19/00; spring		extending, pivoting, or tilting a previously hidden
	mattresses <u>A47C 23/00</u> ; divan bases <u>A47C 23/00</u> ;	1=10.1	second mattress or other bed part
	stuffed mattresses A47C 27/00; beds with special	17/34	. Joining seats, chairs, or couches to form beds
17/00	provisions for nursing A61G 7/00)	17/36	Changing corner couches into a double bed
17/02	• Sofas, couches, settees, or the like, without movable	17/37	• Changing sofas or the like into beds by means of
17/04	parts (Secting furniture e.g.) sofes couches settees or	17/20	furniture other than seats or chairs
17/04	• {Seating furniture, e.g.} sofas, couches, settees, or the like, with movable parts {changeable to beds};	17/38 17/40	. Wall beds
	Chair beds	17/40	<ul><li>having balancing members, e.g. weights, springs</li><li>having supporting legs with fixed position on the</li></ul>
17/045	• • {Seating furniture having loose or by fabric hinge	17/42	floor, e.g. attached thereto
	connected cushions changeable to beds}	17/44	<ul> <li>having means on the supporting legs</li> </ul>
17/12	changeable to beds by tilting or extending the	1//	facilitating the removal of the bed from its
	arm-rests		place
17/13	• • {Seating furniture having non-movable backrest}	17/46	characterised by a rigid mattress-supporting
	changeable {to beds} by increasing the available		member
	{seat} part, e.g. by drawing {seat cushion}	17/48	• characterised by two or more relatively-movable
17/100	forward		{mattress-support} parts
17/132 17/134	• • { with multiple seat cushions }	17/50	characterised by their shape, e.g. multiple-wall
17/134	{by lifting or tilting}	15/50	beds
17/138	<ul><li>• { with a single seat cushion }</li><li>• • • { by lifting or tilting }</li></ul>	17/52	Cabinet beds; Table beds, or like beds; Wardrobe beds
17/136	<ul> <li>changeable to beds by removing parts only</li> </ul>	17/54	• in which the cabinet or the like is tilted with the
17/14	Seating furniture changeable to beds by tilting	17/54	bed
17/10	or pivoting the back-rest	17/56	pivotable on both horizontal and vertical axis
17/161	• • • { with back-rest made of multiple movable	17/58	with extensible mattress support
	cushions}	17/60	. the cabinet being essentially changed in shape in
17/162	• • • {with adjustable back-rest}		sleeping position of the bed
17/163	• • • {and a foot-rest}	17/62	Table beds; Billiard table beds, or like beds
17/165	with forward tiltable back-rest, e.g. back		{(convertible tables <u>A47B 85/06</u> )}
	cushion	17/64	<ul> <li>Travelling or camp beds (adjusting members for</li> </ul>
17/1655	• • • {forming top surface of the bed with non-		rests A47C 20/00; travelling or camp sacks or packs
	rotatable seat cushion}		convertible into beds or mattresses <u>A45F 4/06</u> ;
17/17	with coupled movement of back-rest and seat	17/645	stretchers A61G 1/00)
17/175	• • • with tilting or lifting seat-back-rest pivot	17/645	{dismountable}
17/1753	• • • • {by sliding, e.g. by rollers}	17/66	. having specially-adapted body-carrying surfaces
17/1756	• • • • {by pivoted linkages}	17/68	only the legs being foldable
17/18	and tilting or pivoting the arm-rest	17/70	the bed frame being foldable about a horizontal axis
17/20	thereby uncovering one or more auxiliary	17/705	• • { with detachable legs }
	parts previously hidden ( <u>A47C 17/22</u> takes precedence)	17/703	<ul> <li> {with detachable legs}</li> <li> having cross legs (A47C 17/82 takes</li> </ul>
17/207	• • • with seat cushion consisting of {multiple}	11114	precedence)
17/207	superposed parts, at least one lower {hidden}	17/74	• • the bed being foldable about a vertical axis
	part being used to form part of the {bed}	17/76	having extensible, e.g. telescopic parts
	surface	17/78	<ul> <li>held in shape by stressed cords</li> </ul>
			* *

Sofas; Beds A47C

17/80	adapted to be used in or connected to vehicles	20/041	• • {by electric motors}
17/82	. Trunk beds; Travelling-case or like beds	20/042	• • {by means of screw-and-nut mechanism}
17/84	<ul> <li>Suspended beds, e.g. suspended from ceiling (hammocks <u>A45F 3/22</u>)</li> </ul>	20/043	• • {by means of peg-and-notch or pawl-and-ratchet mechanism}
17/86	<ul> <li>Parts or details for beds, sofas or couches only not fully covered in a single one of the sub-</li> </ul>	20/045	<ul> <li> {urged into an operative or non-operative position at an end of stretch}</li> </ul>
	groups <u>A47C 17/02</u> , <u>A47C 17/04</u> , <u>A47C 17/38</u> , <u>A47C 17/52</u> , <u>A47C 17/64</u> , or <u>A47C 17/84</u> ;	20/046	<ul> <li>{by means of a rack-and-pinion or like gearing mechanism}</li> </ul>
	{Drawers in or under beds}	20/047	• • {by friction locking means}
19/00	Bedsteads (spring mattresses with rigid frame or	20/048	• • {by fluid means}
19/00	forming part of the bedstead A47C 23/00; bed jointing	20/06	the adjustable part immobilising foldable legs
	members or fittings for bedsteads <u>F16B</u> )	20/08	<ul> <li>with means for adjusting two or more rests simultaneously</li> </ul>
19/005	• {dismountable}	20/10	• • using rods
19/02	Parts or details of bedsteads not fully covered in a	20/13	using telescopic rods
	single one of the following subgroups, e.g. bed rails, post rails	20/14	<ul><li>using plate and catch</li></ul>
19/021	• • {Bedstead frames}	20/16	<ul> <li>using prace and eaten</li> <li>using toothed parts, e.g. racks</li> </ul>
19/021	Head or foot boards	20/18	<ul> <li>using friction gearing</li> </ul>
19/022	{Legs}		
19/024	<ul><li> {Direct mattress support frames, Cross-bars}</li></ul>	21/00	Attachments for beds, e.g. sheet holders, bed-
19/023	• • • { With means for preventing frame from		<b>cover holders</b> (bed tables supported on the bedstead
19/02/	sagging}		<u>A47B 23/02</u> ; for children's beds { <u>A47D 7/00</u> },
19/028	• • {for joining separate bedsteads}		A47D 15/00); Ventilating, cooling or heating means
19/04	• Extensible bedsteads, e.g. with adjustment of length,	21/003	<ul><li>in connection with bedsteads or mattresses</li><li>Lighting, radio, telephone or the like connected to</li></ul>
10/045	width, height (for children's beds A47D 7/00)		the bedstead}
19/045	<ul> <li>{ with entire frame height or inclination adjustments}</li> </ul>	21/006	<ul> <li>{Oscillating, balancing or vibrating mechanisms connected to the bedstead (for children's beds</li> </ul>
19/12	Folding bedsteads (travelling or camp beds		<u>A47D 9/02</u> )}
19/122	A47C 17/64)  • • {foldable head to foot only}	21/02	<ul> <li>{Holders for loose bed elements, e.g.} sheet holders; bed cover holders</li> </ul>
19/124	• • {foldable side to side only}	21/022	• • {Sheet holders; Bed cover holders}
19/126	• • {foldable side to side and head to foot, e.g. umbrella type}	21/024	• • • {for holding bed covers above the body of the user (bed-clothes supports to alleviate
19/128	• • {only legs being foldable}		the weight of the bed-clothes on the patient
19/14	• of the lazy-tongs type	24/02/	<u>A61G 7/0501</u> )}
19/20	• Multi-stage bedsteads; {e.g. bunk beds}(multiple-	21/026	• • {Pillow holders; Mattress holders}
	wall beds A47C 17/50; suspended beds	21/028	• • {Holders for facilitating making the bed}
	A47C 17/84); Bedsteads stackable to multi-stage bedsteads	21/04	• Devices for ventilating, cooling or heating
19/202		21/042	• • {for ventilating or cooling (A47C 21/028 and
19/202	<ul><li>. {Stacking or nesting bedsteads}</li><li>. {convertible, e.g. from single bed or sofa}</li></ul>	21/044	A47C 27/007 take precedence)}
19/203	<ul><li>. {convertible, e.g. from single bed of sofa}</li><li>. {Mezzanine beds}</li></ul>	21/044	<ul> <li>• { with active means, e.g. by using air blowers or liquid pumps}</li> </ul>
19/22	<ul> <li>Combinations of bedsteads with other furniture or with accessories, e.g. with bedside cabinets</li> </ul>	21/046	• • { without active means, e.g. with openings or heat conductors}
	(bed-tables A47B 23/00 {; bedside cabinets	21/048	• • {for heating}
	A47B 79/00})	21/046	<ul> <li>Mattress underlays {(mattress tickings or covers)</li> </ul>
20.000		21/00	A47C 27/002)}
20/00	Head -, foot -, or like rests for beds, sofas or the	21/08	Devices for prevention against falling-out,
	<b>like</b> (book rests or bed tables <u>A47B 23/00</u> ; bed-rests specially adapted for nursing <u>A61G 7/065</u> )	21,00	e.g. detachable sidewalls (for children's beds A47D 7/00)
20/02	• of detachable {or loose} type (A47C 20/04, A47C 20/08 take precedence {; for chairs	23/00	Spring mattresses with rigid frame or forming
	<u>A47C 7/00;</u> pillows <u>A47G 9/10</u> })	25/00	part of the bedstead, e.g. box springs; Divan bases;
20/021	• • {Foot or leg supports}		Slatted bed bases
20/022	• • • {for preventing the user from slipping down}	23/002	• {with separate resilient support elements, e.g.
20/023	• • {Arm supports}		elastomeric springs arranged in a two-dimensional
20/025	• • {Supports specially adapted for pregnant women}		matrix pattern}
20/026	• • {Supports for lying in a prone position	23/005	• {foldable or dismountable}
20/027	(A47C 20/025 takes precedence)}  • • {Back supports, e.g. for sitting in bed}	23/007	• {Edge stiffeners (for chair seats <u>A47C 7/342</u> ; for stuffed mattresses <u>A47C 27/06</u> )}
20/027	<ul><li>• {Back supports, e.g. for sitting in bed}</li><li>• • {with a table attached thereto}</li></ul>	23/02	<ul> <li>using leaf springs, e.g. metal strips (wooden springs</li> </ul>
20/04	with adjustable inclination (A47C 20/08 takes	•	<u>A47C 23/06</u> )
-/ - 1	precedence)	23/04	• using springs in compression, e.g. coiled

Sofas; Beds A47C

23/043	• • using wound springs	27/007 • • {permeable to liquid or air in a special way
23/0431	• • • {supporting a flat board or strip}	$(\underline{A47C 27/006} \text{ takes precedence})$
23/0433	• • • {of different resilience}	27/008 • • {protecting against wear or damage}
23/0435	• • • {of adjustable resilience}	• with spring inlays ( <u>A47C 27/20</u> takes precedence)
23/0436	• • • {made from a single wire}	27/045 . Attachment of spring inlays to coverings
23/0438	• • { of special shape }	(upholstery attaching means A47C 31/02); Use
23/047	incorporating inflatable elements	of stiffening sheets, lattices or grids {in, on, or}
23/05	• • Frames therefor; Connecting the springs to the	under spring inlays
	frame {; Interconnection of springs, e.g. in spring	27/0453 • • • {Attachment of spring inlays to outer layers}
	units}	27/0456 • • • {Use of stiffening sheets, lattices or grids in,
23/0507	• • • {using tensioned spiral springs}	on, or under, spring inlays}
23/0515	• • • {using clamps or similar connecting means}	27/05 • with {padding material, e.g.} foamed material, i
23/0522	• • • {using metal wires}	top, bottom, or side layers
23/055	using cords; using textile or rubber bands	27/053 • • • { with only one layer of foamed material }
23/057	Hangers or supports for fastening spring units	27/056 {with different layers of foamed material}
	to frame	27/06 • • Spring inlays
23/06	• using wooden springs, e.g. of slat type {; Slatted bed	27/061 {of adjustable resiliency}
	bases}	27/062 • • • { of different resiliencies }
23/061	• • {Slat structures}	27/063 • • • {wrapped or otherwise protected}
23/062	• • {Slat supports}	27/064 {Pocketed springs}
23/063	• • {by elastic means, e.g. coil springs}	27/065 { of special shape }
23/064	• • • {by elastomeric springs}	27/066 • • • {Edge stiffeners}
23/065	• • · {by fluid means}	27/067 { of plane meandering type}
23/066	• • • {by chains, ropes or belts}	27/068 {made from a single wire}
23/067	• • {adjustable, e.g. in height or elasticity}	27/07 Attaching, or interconnecting of, springs in
23/068	• • • { with additional supports between the ends of	spring inlays
	the slats}	27/08 • Fluid mattresses {or cushions} (connecting valves
23/12	• using tensioned springs, e.g. flat type (A47C 23/02	to inflatable elastic bodies <u>B60C 29/00</u> )
	takes precedence)	27/081 • • {of pneumatic type}
23/125	• • {using vertically mounted tension springs}	27/082 • • • { with non-manual inflation, e.g. with electric
23/14	forming nets; combined with nets	pumps}
23/145	with horizontal interlocking wound springs;	27/083 {with pressure control, e.g. with pressure
	Attachment thereof to the frame	sensors}
23/15	with braided or crossed flat springs or cords;	27/084 {self inflating}
	with horizontal wound springs (A47C 23/145	27/085 • • {of liquid type, e.g. filled with water or gel}
	takes precedence)	27/086 • • { with fluid-like particles, e.g. filled with beads}
23/155	• • • with combinations of flat springs or link chains	27/087 • • { with means for connecting opposite sides, e.g.
	with wound springs	internal ties or strips}
23/16	of plane meandering type	27/088 • • {incorporating elastic bodies, e.g. foam}
23/18	• of resilient webbing	27/10 with two or more independently-fillable chamber
23/20	of resilient sheet form	• with fibrous inlays, e.g. made of wool, of cotton
23/22	of tensioned rubber cords or like cords	27/121 • • {with different inlays}
23/24	• using tensioned textile or other non-resilient strips	27/122 • • {with special fibres, such as acrylic thread,
23/26	• Frames therefor; Connecting the springs to the	coconut, horsehair}
	frame	27/124 • • {with feathers, down or similar inlays}
23/28	Tensioning devices therefor	27/125 • • {with projections, depressions or cavities}
23/30	<ul> <li>using combinations of springs covered by more than</li> </ul>	27/127 • • {with reinforcement sheets, grids or the like}
	one of the groups <u>A47C 23/04</u> , <u>A47C 23/06</u> and	27/128 • • {with inflatable elements}
	A47C 23/12; Frames therefor	with foamed material inlays
23/32	Combinations of nets with springs in	27/142 • • {with projections, depressions or cavities}
22/24	compression; Frames therefor	27/144 {inside the mattress or cushion}
23/34	• with provisions for giving extra support for the head	27/146 {on the outside surface of the mattress or
	or the legs	cushion}
27/00	Spring, stuffed or fluid mattresses {or cushions}	27/148 • • {of different resilience}
	specially adapted for chairs, beds or sofas	27/15 consisting of two or more layers (A47C 27/16
27/001	• {with several cushions, mattresses or the like, to be	takes precedence)
	put together in one cover}	27/16 reinforced with sheet-like {or rigid} elements,
27/002	• {Mattress or cushion tickings or covers (bed linen,	e.g. profiled
	blankets or counterpanes A47G 9/02)}	27/18 in combination with inflatable bodies
27/003	• • {having edge welts or rolls}	27/20 with springs moulded in, or situated in {cavities or} openings in foamed material
27/005	• • {liquid-impermeable}	or; openings in roamed material  with both fibrous and foamed material inlays
27/006	• • {breathable}	• with both florous and roanied material imays

Sofas; Beds A47C

29/00	Nets for protection against insects in connection with chairs or beds (insect nets for animals A01K 13/00; insect nets as travelling equipment
	A45F 3/52); Bed canopies
29/003	• {Bed canopies}
29/006	• {Mosquito nets}
31/00	Details or accessories for chairs, beds, or the like, not provided for in other groups of this subclass, e.g. upholstery fasteners, mattress protectors, stretching devices for mattress nets
31/001	• {Fireproof means}
31/002	• {Anti-earthquake means}
31/002	• {Magnets}
31/004	• {Means for protecting against undesired influence,
31/004	e.g. magnetic radiation or static electricity}
31/005	• {Use of aromatic materials, e.g. herbs}
31/006	• {Use of three-dimensional fabrics}
31/007	• {Anti-mite, anti-allergen or anti-bacterial means}
31/007	• {Use of remote controls}
31/02	<ul> <li>Upholstery attaching means (quilting, quilting)</li> </ul>
31/02	means, fastening, fixing or finishing upholstery B68G 7/00)
31/023	• • {connecting upholstery to frames, e.g. by hooks, clips, snap fasteners, clamping means or the like}
31/026	• • {passing through the upholstery, e.g. upholstery nails or buttons}
31/04	<ul> <li>Clamps for attaching flat elastic strips or flat meandering springs to frames</li> </ul>
31/06	• • • for attaching flat meandering springs
31/08	• Mattress hand-straps {, hand-grips or the like}
31/10	<ul> <li>Loose {or removable} furniture covers</li> </ul>
31/105	• • {for mattresses}
31/11	<ul> <li>for chairs {(for headrests only <u>A47C 7/386</u>; removable protective covers for car seats <u>B60N 2/60</u>)}</li> </ul>
31/113	• • • {liquid-impermeable}
31/116	• • { permeable to liquid or air in a special way}
31/12	• Means, e.g. measuring means for adapting chairs,
	beds or mattresses to the shape or weight of persons (body measuring means for clothing manufacture A41H 1/00)
31/123	• • {for beds or mattresses}
31/126	• {for chairs}
31/120	• • [101 chairs]