Sept. 20, 1955 A. J. WAYSON 2,718,112

SPINNING AND TWISTING RINGS

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Fig. 1.

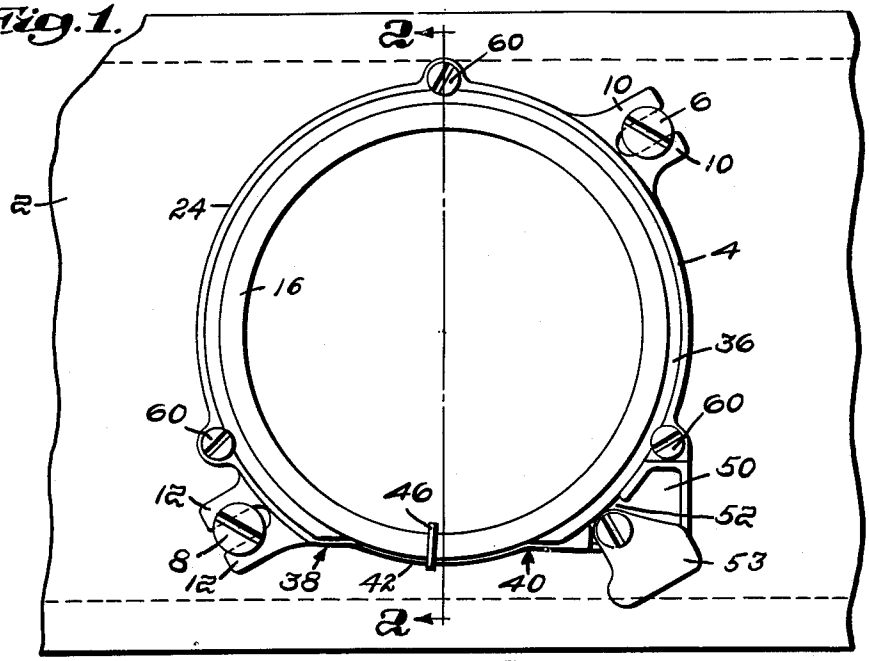


Fig. 2.

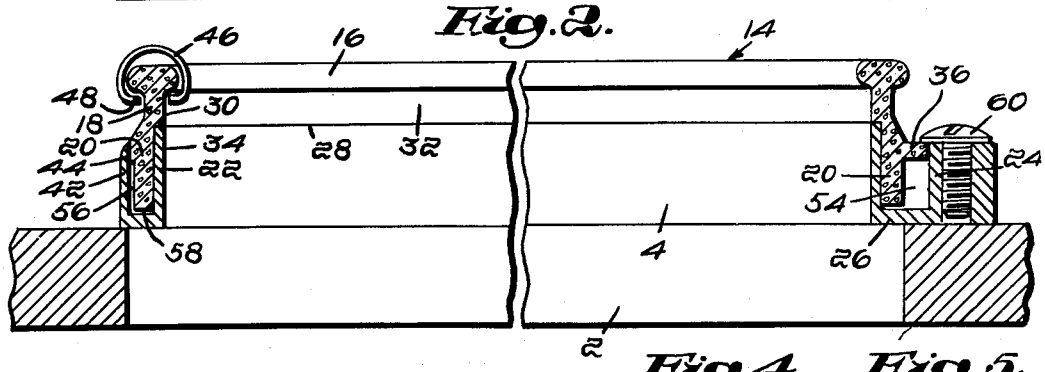


Fig. 4.

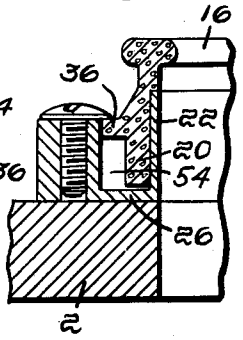


Fig. 5.

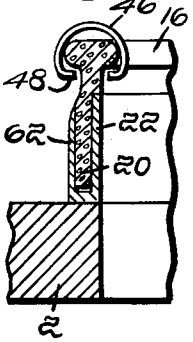
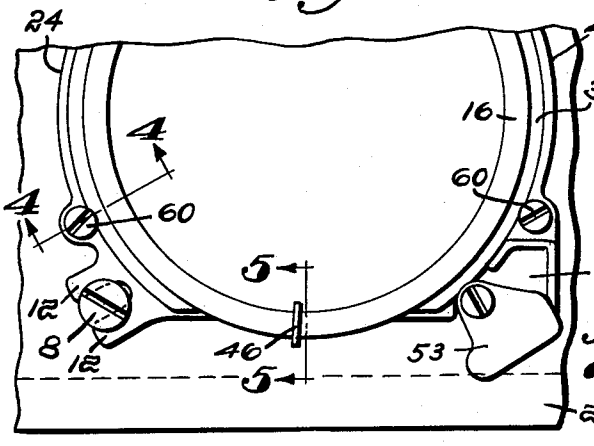


Fig. 3.



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SPINNING AND TWISTING RINGS

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Fig. 6.

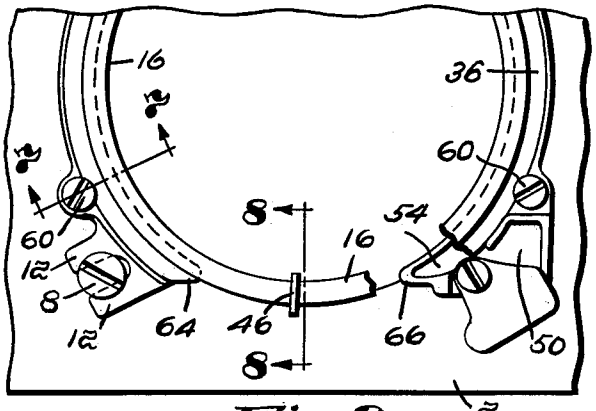


Fig. 7.

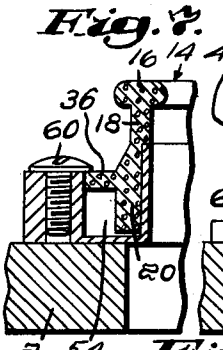


Fig. 8.

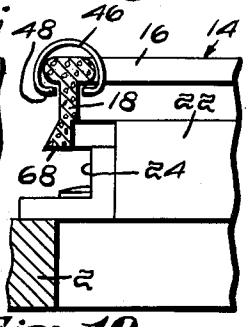


Fig. 9.

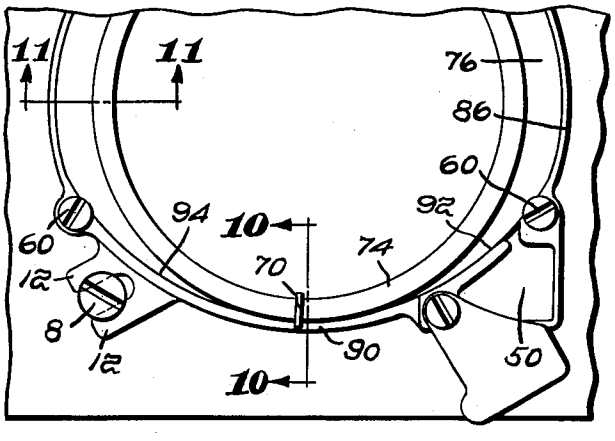


Fig. 10.

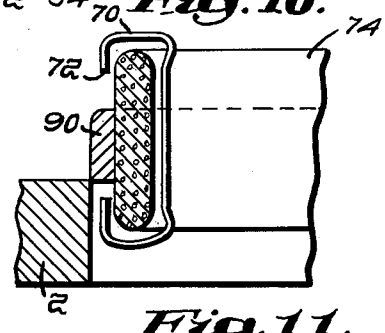


Fig. 11.

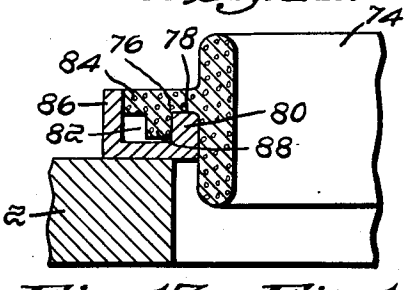


Fig. 12.

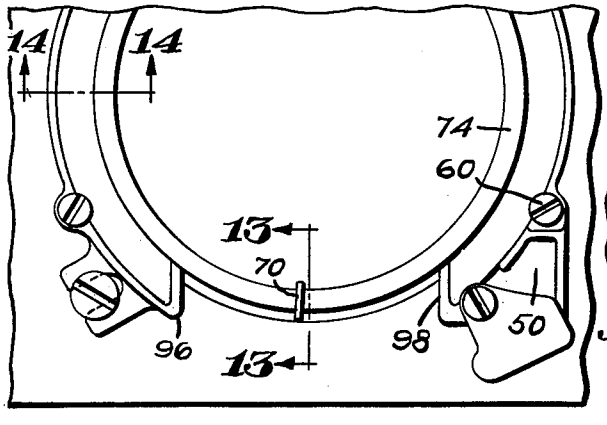
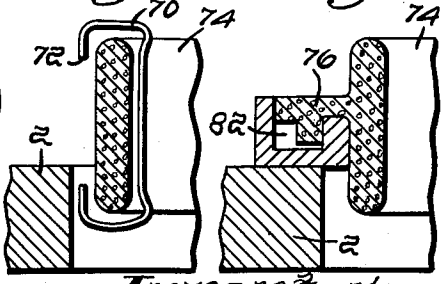


Fig. 13. Fig. 14.



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Fig. 15.

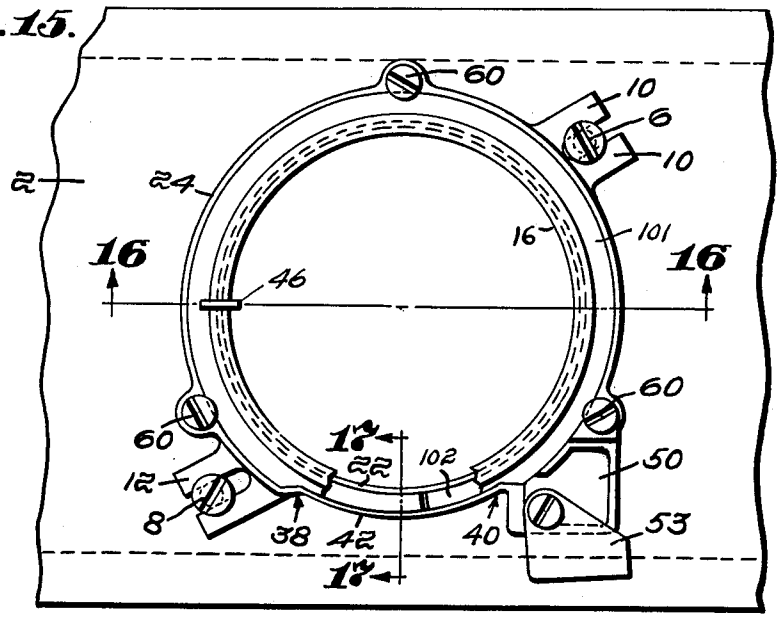


Fig. 16.

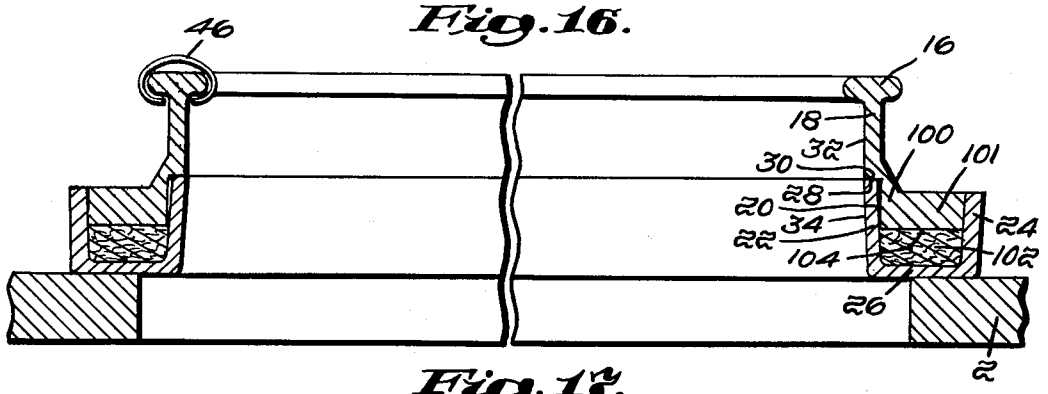
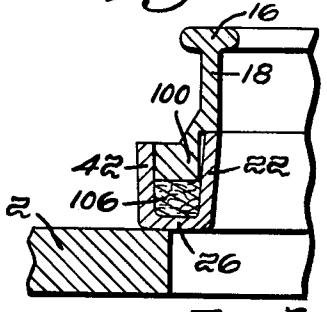


Fig. 17.



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United States Patent Office 2,718,112 Patented Sept. 20, 1955

2,718,112

SPINNING AND TWISTING RINGS

Andrew J. Wayson, Needham, Mass., assignor to Merriman Brothers, Inc., Boston, Mass., a corporation of Massachusetts

Application November 4, 1952, Serial No. 318,585

15 Claims. (Cl. 57—120)

This application is a continuation-in-part of the application of Andrew J. Wayson for Spinning and Twisting Rings, Serial No. 246,266 filed September 12, 1951, and now abandoned.

This invention pertains to spinning and twisting rings such as are employed in ring spinning and similar frames in the production of textile yarn or thread and relates more specifically to a spininng ring assembly of the self-lubricating type wherein the traveler guiding annulus is of porous oil-absorbent material. A self-lubricating ring of the type in question is shown, for example, in the patent to George F. Albrecht No. 2,084,756 dated June 22, 1937. In a later patent to George F. Albrecht No. 2,403,255 dated July 2, 1946, there is shown a porous oil absorbent ring mounted on a support or holder shaped to provide an annular oil reservoir, designed to furnish a continuous supply of oil to the porous ring. This arrangement is effective and makes hand oiling of the ring unnecessary.

In all of the prior spinning and twisting ring constructions of the type shown in the aforesaid patents, in which the traveler moves on a guiding annulus, the supporting structure for the annulus is such that the piecing of broken yarns is difficult for the operator to accomplish with speed and without the soiling of the yarn from the oil on the annulus, particularly if the annulus is made of porous material as disclosed in the above Albrecht patents. Hereinafter, in the specification and claims reference will be made solely to a spinning ring simply as a matter of convenience but it will be understood that when the term spinning ring is used, it also includes a twisting ring. As is well known, the function of spinning and twisting rings is identical and the nature and method of operation of these two types of rings are substantially the same.

With the foregoing in mind, it is an object of the present invention to provide a spinning ring unit consisting of the spinning ring and its supporting elements designed in such manner that it permits the operator of a spinning frame easily to piece-up broken yarns as they may occur. The broken yarn may be readily placed under the traveler even though the spinning ring is made of porous material constructed to absorb oil and mounted on an oil reservoir base. The design of the ring of the present invention contemplates the elimination of a sufficient portion of the base supporting structure of the ring at the front of the frame so that there will be adequate room for the operator to seize the broken yarn in the usual manner and place it under the outer hook end of the traveler. Since operators customarily take care of several spinning frames, on which there may be as many as 100 to 400 spindles, any saving in the time required for piecing-up and minimizing soiling of the yarn by the ring constitutes a substantial economic advantage in this field.

While the holder and support of the annulus are cut away or reduced in front, as aforesaid, still no change is made in the annulus portion of the ring so that the normal operation of the ring and traveler remains unchanged.

Another object of the invention is to provide the aforedescribed cut away or reduced supporting structure for rings made of all kinds of porous materials that may be suitable for use in this connection although the principal porous material that has been used commercially up to the present time for spinning rings has been that broadly described in the first Albrecht patent mentioned above.

Another object of the present invention is to provide a shield on the inside of the ring which is flush with the upper portion of the internal bore of the ring so that no accumulations of dust or lint can collect in this area, thereby minimizing the possibility of the yarns becoming soiled by oily deposits in this area. In addition to the inner wall of the supporting base or reservoir portion providing a flush joint with the interior of the ring, the present invention also contemplates that the inner wall be sufficiently high with respect to the exposed interior vertical portion of the ring to act as a shield to minimize the amount of exposed oily surface. The high shield portion thus not only serves to eliminate the exposed oily surface but also prevents oil leakage on the inside of the ring in case the oil reservoir should be overfilled.

Still another object of the invention is the provision of improved means for transmitting oil from the underlying reservoir to the annulus at a rate which will be suitable for various conditions of operation.

These and other objects of the invention will become more apparent as the description proceeds with the aid of the accompanying drawings in which

Fig. 1 is a plan view of a spinning ring unit including the present inventions and located in normal position on a spinning frame.

Fig. 2 is a vertical section on enlarged scale on the line 2—2 of Fig. 1, the same being broken away in its center portion to conserve space.

Fig. 3 is a fragmentary view similar to that of Fig. 1, showing a modified type of supporting base for the ring.

Fig. 4 is an enlarged vertical section on the line 4—4 of Fig. 3.

Fig. 5 is an enlarged vertical section on the line 5—5 of Fig. 3.

Fig. 6 is a fragmentary plan view similar to Fig. 1 showing still another form of base with the ring broken away in part to show more plainly the character of the base.

Fig. 7 is an enlarged vertical section on the line 7—7 of Fig. 6.

Fig. 8 is an enlarged vertical section on the line 8—8 of Fig. 6.

Fig. 9 is a fragmentary plan view similar to Fig. 1, showing still another modification of the supporting base construction in which the annulus is vertical as distinguished from the horizontal form shown in Fig. 1 to 8.

Fig. 10 is an enlarged vertical section on the line 10—10 of Fig. 9.

Fig. 11 is an enlarged vertical section on the line 11—11 of Fig. 9.

Fig. 12 is a fragmentary plan view similar to Fig. 1, showing another modification of the supporting base construction.

Fig. 13 is an enlarged vertical section on the line 13—13 of Fig. 12.

Fig. 14 is an enlarged vertical section on the line 14—14 of Fig. 12.

Fig. 15 is a plan view of a modification of the spinning ring shown in Figs. 1 to 5.

Fig. 16 is a section on the line 16—16 of Fig. 15.

Fig. 17 is a section on the line 17—17 of Fig. 15.

Before referring to the various figures in detail, the nature of the invention will be set forth generally. In

each of the figures there is shown a spinning ring made of porous oil-receptive material. That is, the ring is of such character that when a part is placed in oil or against an oily surface or an oil carrying substance, capillary action will result in the oil being drawn into the ring and distributed to all parts thereof, including those parts that are outside of the oil chamber or remote from the oil supply. When the term spinning ring is used, applicant refers to the integral element that carries the traveler but not to the supporting base.

In Figs. 1 to 8, a horizontal ring is shown. In Figs. 9 to 14 a vertical ring is shown and in Figs. 15 to 17 another specie of horizontal ring is illustrated. These two types of rings are commonly used in the textile industry along with the travelers illustrated in connection therewith.

In all of the figures there is shown depending from the ring proper, an integral flange which is positioned in a corresponding oil reservoir that forms the supporting base for the ring. In Figs. 1 to 8 and 9 to 14, the flange extends close to the bottom of the reservoir. In Figs. 15 to 17, the flange has been shortened and a wick inserted between the bottom of the flange and the bottom of the reservoir.

In those instances where the oil reservoir is continuous, the flange or wick is likewise continuous for its entire circumference. In other cases where the reservoir has been discontinued over a portion of its circumference, it is necessary that the flange or wick likewise be discontinued for a corresponding distance.

In all of the figures, it will also be noted that at the front of the ring which is that portion at the bottom of Figs. 1, 3, 6, 9, 12 and 15, the width of the supporting base that constitutes the oil reservoir is greatly reduced, and in some cases entirely eliminated so that there is less obstruction in the way of the operator's fingers as he attempts to secure a broken yarn under the outside end of the traveler. At the same time, the height of the outer end of the traveler is maintained at a substantial elevation above the surface of the spinning frame itself so that in a vertical direction there is ample room for the operator to bring the yarn into engagement with the traveler when the traveler is positioned at the front of the ring.

In all of the enlarged sectional drawings of the horizontal annulus, Figs. 2, 4, 5, 7, 8, 16, and 17, it will also be noted that the inside of the wall of the circular reservoir is higher than the exterior wall and presents a flush surface with the inside of the upper portion of the flange to which the horizontal annulus of Figs 1 to 8 and 15 to 17 is connected. The effect of this construction is that the exposed oily vertical surface on the interior of the ring is minimized, thereby reducing the possibility of collection of lint and dirt and other material that might soil the yarn.

Another common feature found in all of the figures is an additional external oil reservoir into which the oil supply is initially placed and from which it may flow circumferentially about the circular reservoir supporting base. The depth of the external reservoir is controlled so that when full the oil will not overflow the outer wall of the circular reservoir.

With these preliminary remarks in mind, the description will now proceed in more detail. In Fig. 1 the upper surface of a spinning frame is indicated at **2** and on this is positioned a spinning ring supporting base **4**, which base forms the oil reservoir. The base is secured to the frame by screws **6** and **8**, the heads of which rest over the outwardly extending lugs **10** and **12**.

As shown more plainly in Fig. 2, a spinning ring carrying a conventional traveler is shown as mounted on the supporting base **4**. This ring generally indicated at **14** comprises a horizontal annulus **16** from which there extends downwardly a flange consisting of a vertical portion **18** and a further downward continuation **20** which forms a bottom flange fitting within the confines of the supporting base **4**. The base **4** has an interior wall **22**, an exterior wall **24** and a bottom **26** connecting the two walls. This construction obviously provides an annular well or reservoir within which the lower flange portion **20** of ring **14** rests. The upper edge **28** of wall **22** rests against an under cut area **30** of portion **18** in such manner that the inner surface **32** of portion **18** and the inner surface **34** of wall **22** are flush and in vertical alignment.

The bottom flange portion **20** of ring **14** has a laterally extending portion **36** forming in effect a horizontal flange which is in reality part of the bottom flange **20**. This flange **36** closes the remaining space between the upper end of flange **20** and the interior wall **24**. The top of the laterally extending portion **36** is flush with the top of wall **24** and presents a relatively close fit with the interior of wall **24**.

As can be seen in Figs. 1 and 2 the distance between walls **24** and **22** is reduced at the front of the frame over that sector between the numbers **38** and **40**. Not only is the wall in this portion, which is numbered **42**, arranged to be closer to wall **22**, but that portion **36** of the flange **20** is correspondingly reduced in width to present a very narrow section **44**. Thus, it can be seen that when the traveler **46** is at the front of annulus **16**, as shown in Figs. 1 and 2, the operator may bring his finger to a position where it will be under the outer edge of annulus **16** to a degree which will materially facilitate placing the broken yarn under the hook end **48** of the traveler **46**. That is to say, by reducing the width of the reservoir at the front of the ring to a point where it is little more than the thickness of flange **20** of the ring, a construction is provided which materially speeds up the piecing of broken yarns.

A supplementary oil reservoir **50** with a cover **53** is provided at the side of the base and this reservoir has an opening **52** which leads into the channel **54** formed by the inner and outer walls and the bottom. Channel **54** is coextensive with flange **20** but has its width reduced as indicated at **56** at the front of the ring. The bottom **58** of flange **20** is spaced slightly from the bottom **26** of channel **54**.

Oil in the channel **54** will enter the porous ring **14** and will spread upwardly until it permeates every part of annulus **16**. That is, oil will exude from the annulus continuously in an amount sufficient to provide constant lubrication as the traveler **46** moves thereon at the usual high rotational speeds. The ring **14** is rigidly secured to base **4** by the heads of screws **60** which screws are threaded into portions of base **4**.

The reduction in the width of the channel **54** from the normal full width shown at the right of Fig. 2 to the minimum shown at the left in Fig. 2 occurs at the portions of the outer wall **24** between the numbers **38** and **40** and it is at these points that the flange **36** is correspondingly reduced in width until it reaches its minimum width as at **44**.

A variation of the construction heretofore described is shown in Figs. 3, 4 and 5. In this case, the flange **36** is entirely eliminated at the front of the ring and the reservoir outer wall is correspondingly moved inwardly as at **62** so that the flange **20** fits closely between inner wall **22** and the outer front wall sector **62**. This, however, has no effect on the lubrication of the annulus **16** because the ring being made of porous material is capable of absorbing and spreading the oil to all areas even though the source of supply may be some distance from the ultimate surface to be lubricated. This construction further facilitates the piecing-up of broken yarns as the operator may move his finger to a point still closer to the hook end **48** of traveler **46**.

The construction shown in Figs. 6, 7 and 8 constitutes another modification of the ring having a horizontal annulus **16**. In this construction the channel **54** is not continuous about its entire circumference. Instead, the channel ends and is closed at **64** and **66** and the flange **20** is correspondingly eliminated from the ring **14** over that

sector where there is no oil channel. Thus, at the front of the ring, the upper flange portion **18** terminates in its downward direction at **68** to present a segment unsupported by the inner wall **22** of the base **4**. However, this lack of support is in no way detrimental as the load on the annulus **16** is relatively light and can easily be supported by the portion **18** over the cut away front sector.

Again in this modified construction of Figs. 6, 7, and 8 it is apparent that the operator may readily bring his finger to a position where it will be easy for him to feed the broken yarn under the hook end **48** of traveler **46**.

In the construction shown in Figs. 9 to 14, the type of spinning ring shown therein is of the vertical type as distinguished from the horizontal type shown in Figs. 1 to 8.

In the vertical type the traveler **70** (see Fig. 10), having its upper hook end at **72**, travels about an annulus **74** which has its long dimension vertical. This annulus has over the majority of its circumference an outwardly extending flange **76**, the inner portion of which at **78** rests on an inner wall **80** of channel **82**. The outer portion **84** of flange **76** fits closely with the upper interior of the outer wall **86** of the channel. Flange **76** also has an additional flange **88** depending therefrom which is in a position to be immersed in and to receive the oil in channel **82** and by its porosity to carry the oil upward through flange **76** and thence inwardly to annulus **74** so that all parts of the surface of annulus **74** will be lubricated with respect to the traveler **70**.

The channel **82** has a bottom **87** which extends from the outer wall **86** inwardly to a position where it is directly against the outer vertical wall **89** of the annulus **74**. Thus, the annulus **74** is not only supported by the bottom **87** through the medium of the inner wall **80**, which is an upward extension of the bottom at its inner circumference, but is also engaged laterally so that no portion of the under surface of flange **76** is exposed downwardly. By having bottom **87** support annulus **74**, there being tight engagement at inner portion **78** between wall **80** and flange **76** and tight engagement between inner circumference of bottom **87** with the outer vertical surface **89**, any lubricant that might otherwise exude from flange **76** to run down on the ring frame is prevented from so doing. On the contrary, the first point at which lubricant can escape from the outer under side of the ring is at that point immediately below the point of contact of the bottom edge of bottom **87** with the outer surface of the annulus. Such lubricant oozing out of the annulus below bottom **87** would then run down the outer surface of annulus **74** where it would in time be picked up by the traveler **70**. No sealing member or gasket of any kind is required between bottom **87** and flange **76** at the various points of contact because of the close fit of annulus **74** within the inner circumference of bottom **87**.

Again, however, in this construction, as in the previously described forms, provision is made whereby the operator may more readily piece-up broken yarns. This is is accomplished by eliminating completely over the middle portion of the front of the ring the channel **82** so that annulus **74** rests directly against a single vertical element indicated at **90** in Fig. 10. As can be seen in Fig. 9, the wall **86** moves gradually as at **92** and **94** toward the inner wall **80** until the two walls merge to form a single wall **90** in the center front, against which annulus **74** rests. In this construction, as in the construction of Figs. 1 to 8, the depending flange **88** absorbs and carries by its porosity oil to that portion of annulus **74** which is at the front of the spinning frame but which lacks any part of the flange **76** in that sector. The loading of the annulus is insufficient to cause any damage to the annulus over the small unsupported section.

The construction in Figs. 12, 13 and 14 is in general similar to that shown in Figs. 9 to 11 but differs in this respect. The channel **82** terminates abruptly at **96** and **98** with the channel up to these points being of normal

width as shown in Fig. 14. The annulus **74** over the sector between channel ends **96** and **98** is completely unsupported as indicated in Fig. 13 but again the oil carrying properties of the porous ring result in this portion of the annulus being lubricated as well as the other parts which have flange **76** in the channel **82**. It will be seen in this construction that the operator may bring his finger to a position under hook end **72** of the traveler **70** so that the piecing-up operation may be speedily accomplished.

The construction shown in Figs. 15, 16 and 17 constitutes a variation of the construction shown in Figs. 1 to 5. The annulus **16** is mounted in the usual manner on the upper vertical portion **18** of the supporting flange. The undercut shoulder **30** rests on the top edge **28** of the inner wall **22** of the reservoir. The walls of the reservoir are shown as having slight draft to facilitate their manufacture by the casting process.

The bottom part of the supporting flange that corresponds to flange **20** in Figs. 1 to 8 is numbered **100**. This flange, like flange **20** is located within the oil reservoir, but is shorter and wider with the outer laterally extending portion **101** of the flange acting to cover the outer part of the reservoir. The lower part of the reservoir below the flange **100** is filled with a wick **102**, preferably of felt, which transmits oil continuously to the under surface **104** of flange **100** at a rate somewhat slower than is achieved by the use of the metallic wick or flange **20** of Figs. 1 to 5.

The wick **102** would not be necessary if the oil level in the reservoir could be maintained at a sufficiently high level so that oil would always be in engagement with the underside **104** of flange **100**. However, since the oil level will very likely fall below that point before normal refilling of the reservoir **50** would occur, the insertion of the wick **102** makes it possible to supply oil continuously to flange **100** regardless of the oil level in reservoir **50**.

In the construction shown in Figs. 15, 16 and 17, the front section of the base is narrowed in the same manner as in Figs. 1 to 5 and the wick **102** is correspondingly narrowed at this section as indicated at **106** in Fig. 17. The wick in this construction is continuous the same as flange **20** is continuous in Figs. 1 to 5. If a base construction such as shown in Figs. 6, 7 and 8 should be used, then the wick **102** would not be continuous but would terminate at the ends **64** and **66** of the reservoir as shown in Fig. 6.

If desired to feed oil at a slower rate to the vertical ring **74** shown in Figs. 9 to 14, the flange **88** which acts as a metallic wick with a large surface area could be eliminated and replaced by a wick such as **102** which would fill all of the space **82** under the flange **76** and would transmit oil to the ring **74** at a slower rate. Thus, by the use of the metallic wicks **20** or **88** or felt wicks **102** of varying densities, the rate of oil transmission to the annulus can be controlled. This is important because some installations require a greater oil supply than others.

It will be understood from the foregoing explanation and description that the invention contemplates a ring and base in which there is an oil reservoir of adequate proportions and capacity to supply oil to the depending flange of the ring which is located directly in the oil channel. The oil may be received by the flange either by direct immersion in the oil as indicated in Figs. 1 to 14 or through a wick as shown in Figs. 15, 16 and 17. The porosity of the ring will be of a character to carry oil from the immersed or wick fed flange to all parts of the annulus whether the annulus be of the horizontal or vertical type. At the same time, the front section of the base is so reduced in width or eliminated entirely as to permit the operator to bring his finger or fingers to a position much closer to the outer hook end of the

traveler than would be the case were the oil reservoir of uniform dimensions about its entire circumference.

It will be understood that when reference is made in the claims to a spinning ring of porous material such term includes all types of porous materials which are capable of functioning as a spinning ring of the type described in the textile industry.

It is my intention to cover all changes and modifications of the example of the invention herein chosen for purposes of the disclosure which do not constitute departures from the spirit and scope of the invention.

I claim:

1. In combination, a spinning ring of porous material adapted to absorb a lubricant, said ring comprising an annulus for receiving and guiding a traveller thereon and a circular flange connected to said annulus and depending with respect thereto for at least a majority of the circumference of said annulus, a supporting base including inner and outer walls and a bottom constituting an oil reservoir and said flange being positioned therein, said reservoir being of greater volume than the said flange positioned therein, said annulus being supported by the inner wall of said base, said flange including an outwardly extending horizontal portion for substantially closing the space between said inner and outer walls and to act as a cover for that part of the said reservoir that would otherwise be open, said flange acting as means for transmitting oil in said reservoir to said annulus, said supporting base being modified over the front sector of said ring where the operator normally places his finger to position a broken yarn under said traveler so as to eliminate those portions of said base that without such modification would normally extend forwardly from said ring at said sector whereby said operator may position his finger in closer relation to the outer hook end of said traveler.

2. In combination, a spinning ring of porous material adapted to absorb a lubricant, said ring comprising an annulus for receiving and guiding a traveler thereon and a circular flange connected to said annulus and depending with respect thereto for at least a majority of the circumference of said annulus, a supporting base comprising an oil reservoir and said flange being positioned therein, said reservoir being of greater volume than the said flange positioned therein, said reservoir having a bottom and inner and outer walls, the top of said inner walls engaging an undercut portion of said flange and the inner surface said inner wall being flush with the inner surface of the flange resting thereon and immediately thereabove, that part of said supporting base located at the front of said ring being of less transverse dimension than at the sides and rear of said base without materially affecting the volume of oil available to be absorbed by said flange and whereby the operator may be enabled to place his finger in closer relationship to the traveler when the traveler is positioned at the front of said ring.

3. In combination, a spinning ring of porous material adapted to absorb a lubricant, said ring comprising an annulus for receiving and guiding a traveler thereon and a vertical flange connected to said annulus and depending with respect thereto, a supporting base comprising an inner wall, an outer wall and a bottom and constituting an oil reservoir, said flange being positioned in said reservoir, said reservoir being of greater volume than the said flange positioned therein, said ring being supported by the said inner wall, said flange including an outwardly extending portion for substantially closing the space to said outer wall, said reservoir being reduced in width at the front sector of said ring at the position where the operator normally places his finger in the piecing-up operation, said reduction in width being accomplished by reducing the width of said outwardly extending portion and moving said outer wall correspondingly closer to said inner wall.

4. The combination as set forth in claim 3, the bottom of said flange being spaced slightly above the bottom of said reservoir and being immersed directly in the oil in said reservoir.

5. The combination set forth in claim 3, the bottom of said flange being engaged by a wick positioned in said reservoir.

6. The combination set forth in claim 2 and a wick in said reservoir engaging the under side of said flange.

7. The combination as set forth in claim 1, the inner surface of said inner wall being flush with the inner surface of said vertical flange immediately above the top edge of said inner wall.

8. The combination as set forth in claim 1, said base having at the side thereof a supplemental oil reservoir into which oil may be poured and a passage therefrom leading to said oil reservoir whereby the latter may be readily filled.

9. The combination as set forth in claim 2, said base having at the side thereof a supplemental oil reservoir into which oil may be poured and a passage therefrom leading to said oil reservoir whereby the latter may be readily filled.

10. The combination as set forth in claim 3, said base having at the side thereof a supplemental oil reservoir into which oil may be poured and a passage therefrom leading to said oil reservoir whereby the latter may be readily filled.

11. In combination, a spinning ring of porous material adapted to absorb a lubricant, said ring comprising an annulus for receiving and guiding a traveler thereon and an oil receiving flange connected to said annulus and depending with respect thereto for at least a majority of the circumference of said annulus, a supporting base comprising an inner wall, an outer wall, and a bottom and constituting an oil reservoir, said flange being positioned in said reservoir, said reservoir being of greater volume than the said flange positioned therein, said reservoir having its outer wall moved inwardly toward said inner wall at the front sector of said ring thereby to permit the operator to position his finger more closely under the outer hook end of said traveler to facilitate the piecing-up operation.

12. In combination, a spinning ring of porous material adapted to absorb a lubricant, said ring comprising an annulus for receiving and guiding a traveler thereon and an oil receiving flange connected to said annulus and depending with respect thereto for at least a majority of the circumference of said annulus, a supporting base comprising an inner wall, an outer wall and a bottom and constituting an oil reservoir, said flange being positioned within said reservoir, said reservoir being of greater volume than the said flange positioned therein, the width of said oil reservoir being greater than the thickness of said flange over the majority of its circumference, said reservoir having its outer wall moved inwardly toward said inner wall at the front sector of said ring thereby to permit the operator to position his finger more closely under the outer hook end of said traveler to facilitate the piecing-up operation.

13. The combination set forth in claim 11 and a wick in said reservoir engaging the under side of said flange.

14. In combination, a spinning ring of porous material adapted to absorb a lubricant, said ring comprising an annulus for receiving and guiding a traveler thereon and a circular flange connected to said annulus and depending with respect thereto for at least a majority of the circumference of said annulus, a supporting base including inner and outer walls and a bottom constituting an oil reservoir and having said flange positioned therein, said annulus being supported by the inner wall of said base, said flange acting as means for transmitting oil in said reservoir to said annulus, said supporting base being modified over the front sector of said ring where the operator normally places his finger to position a broken yarn under said traveler so as to eliminate those portions of said base that without such modification would normally extend

forwardly from said ring at said sector whereby said operator may position his finger in closer relation to the outer hook end of said traveler.

15. In combination, a spinning ring of porous material adapted to absorb a lubricant, said ring comprising an annulus for receiving and guiding a traveler thereon and a flange connected to said annulus and depending with respect thereto, a supporting base comprising an inner wall, an outer wall and a bottom and together constituting an oil reservoir, said flange being positioned in said reservoir, said ring being supported by said inner wall, said reservoir being discontinued at the front sector of said ring at the position where the operator normally places his finger in the piecing-up operation, and said flange being correspondingly eliminated for the discontinued section of said reservoir.

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